

DOCUMENT RESUME

ED 319 109

EA 021 754

TITLE Employee Participation Programs: Considerations for the School Site. Studies in Collective Bargaining.

INSTITUTION National Education Association, Washington, D.C. Research Div.

PUB DATE Feb 88

NOTE 39p.

AVAILABLE FROM NEA Professional Library, P.O. Box 509, West Haven, CT 06516.

PUB TYPE Reports - Descriptive (141)

EDRS PRICE MF01/PC02 Plus Postage.

DESCRIPTORS Administrative Organization; Decision Making; Elementary Secondary Education; Employer Employee Relationship; Organizational Development; *Participative Decision Making; School Administration; *School Based Management; *Teacher Participation; Teamwork

ABSTRACT

Site-based decisionmaking programs offer important opportunities for school systems; however, the risks involved are significant and the decision to embrace the concept at the local level is a highly complex one. With site-based decisionmaking programs, teachers are directly involved in making decisions that affect the whole school, not merely their individual classrooms. Thinking in both the private sector and in the education community suggests that organizational effectiveness is enhanced when employees responsible for implementing decisions are given some measure of authority in their creation. This publication examines: (1) the history of employee participation programs in America; (2) the use of site-based decisionmaking programs in public education; (3) the potential advantages and disadvantages of employee decisionmaking participation programs for local school districts; (4) the relationship of site-based decisionmaking programs to the collective bargaining process; (5) the legality of site-based employee participation programs; and (6) practical suggestions for deciding when to introduce site-based decisionmaking programs and how to structure them. Also provided are examples of employee participation programs in education from Denver, Seattle, Fairfax County (Virginia), Florida, Iowa, and Indiana. (61 references) (KM)

* Reproductions supplied by EDRS are the best that can be made *
* from the original document. *

Employee Participation Programs: Considerations for the School Site

National
Education
Association

PROFESSIONAL AND ORGANIZATIONAL DEVELOPMENT/RESEARCH DIVISION

U.S. DEPARTMENT OF EDUCATION
Office of Educational Research and Improvement
EDUCATIONAL RESOURCES INFORMATION
CENTER (ERIC)

☒ This document has been reproduced as
received from the person or organization
originating it.
☐ Minor changes have been made to improve
reproduction quality.

• Points of view or opinions stated in this docu-
ment do not necessarily represent official
OERI position or policy.

"PERMISSION TO REPRODUCE THIS
MATERIAL HAS BEEN GRANTED BY

Linda Hill

TO THE EDUCATIONAL RESOURCES
INFORMATION CENTER (ERIC)."

Contents

3	Foreword	26	Participation in the Public Sector
4	Introduction	28	The Legality of Employee Participation Programs
7	Employee Participation: An Historical Note	31	Some Conditions Are Better than Others
9	Employee Participation Programs in Education	32	Guidelines for Local Associations
20	Employee Participation and Collective Bargaining	33	Summary Implications for Local Associations
22	The Potential Benefits of Employee Participation	34	References
24	The Pitfalls of Participation		

Additional copies may be ordered from the NEA Professional Library, P.O. Box 509, West Haven, CT 06516.

Reproduction: No part of this report may be reproduced in any form without written permission from NEA Research, except by NEA-affiliated associations. Any reproduction of the report materials must include the usual credit line. Address communications to Editor, NEA Research.

National Education Association
1201 Sixteenth Street, N.W.
Washington, D.C. 20036

Copyright © 1988
National Education Association of the United States

Foreword

Site-based decision-making programs offer many opportunities for local Associations. However, the risks involved are not insignificant and the decision to embrace the concept at the local level is a highly complex one. Relevant factors to be considered include: the attitudes of the Association's leaders; the attitudes of the school board and the school board's negotiator, the importance of the issue(s) involved; the expense involved; and the appropriateness of participative structures for dealing with particular issues. There are no clear-cut policies on this question. Association leaders and bargainers must weigh the evidence and judge the possible risks and advantages of participative structures for their circumstances.

In this publication, we examine the history of employee participation programs in the United States; the use of employee participation (site-based decision-making programs) in public education; the potential advantages and disadvantages of site-based decision-making programs for local Associations; the relationship of site-based decision-making programs to the collective bargaining process; the legality of site-based decision-making programs; and practical suggestions for deciding when to introduce site-based decision-making programs and how to structure them.

Several examples of site-based decision-making efforts are provided in the text. These efforts are intended to serve *only* as representative examples of the kinds of participative structures we are beginning to see in public education. It is for this reason that a discussion of the early stages of an AFT effort in Indiana was included in this text. The examples contained herein should in no way be seen as a complete or even a comprehensive guide to existing site-based decision-making efforts. Eventually, we hope to publish a more exhaustive compendium of site-based decision-making programs to be used as a resource for local Associations. Any individual or any group that wishes to have their program included in such a compendium is encouraged to send a description to NEA Research, Attention: Site-Based Decision-Making Work Group.

Because U.S. public education's experience with employee participation efforts is still in its infancy, we have also turned to the private and noneducation public sector experience with employee participation to help us assess the potential risks and benefits these programs hold for local Associations. Both within education and outside of education, employee participation programs are known by many labels. With minor exceptions, we have used the term *site-based decision-making program* to designate participative efforts in education. For programs in private and noneducation public settings, we have used the term *employee participation program*. Where the discussion of these efforts in both education and the private sector is conflated, the term *employee participation program* is used to apply to both.

Questions about this publication should be directed to NEA Research.

February 1988

Introduction



The convergence of the education reform movement and private sector experimentation with alternative forms of work organization has generated intense interest in site-based decision making in the educational community. With site-based decision-making programs, teachers are directly involved in making decisions that affect the whole school, not merely their individual classrooms. Thinking in both the private sector and the education community suggests that organizational effectiveness is enhanced when the employees responsible for implementing decisions are given some measure of authority in their creation. Principle Five of NEA's Nine Principles underscores this point:

Authority must be vested in the local school faculty. *Key decisions about teaching and learning should be made by those closest to the students and the community, not by large bureaucracies whose assembly-line approach diminishes expectations of students and teachers.*

The involvement of teachers in decision making at the school site signals far more than an increase in their individual and collective authority. Site-based decision-making programs encourage collegiality, reducing the isolation that teachers so often experience. As a result of better communication, school goals and objectives become more clearly defined, become more coherent, and become more widely shared among individual faculty members. Additionally, better communication among teachers fosters the collegial exchange of ideas and information so necessary for effective professional practice.

Empirical and conceptual support for site-based decision-making programs can be found in the research on effective schools. In the 1970s, researchers attempting to unravel the mystery behind widely disparate results in federally funded programs for educational change discovered school organization to be a major factor in educational effectiveness. In effective schools, a high degree of individual discretion is coupled with well-defined goals and clear expectations. Faculty as well as principals contribute to the establishment of school goals and priorities. Clear lines of communication exist among teachers and between teachers and administrators.

Few in the educational community would disagree that increased opportunities for collegial interaction and faculty involvement in building-level decision making improve the educational process. However, some member advocates do perceive site-based decision-making programs as potentially threatening to the collective bargaining process. As a result, the professional and educational benefits to be derived from such programs are shunted aside in favor of protecting the benefits to be derived from a strong collective bargaining process. This would make sense if site-based decision-making programs were *necessarily* opposed to collective bargaining. This is not the case, however. As examples of successful programs attest, site-based decision-making programs offer a unique opportunity to integrate the traditional collective bargaining concerns of teachers with their

professional interests. Through collective bargaining, teachers can secure a part in decision-making roles at the building level. Conversely, through their involvement in decision making at the building level, teachers can secure more comprehensive contracts.

Because of the inordinate influence of U.S. industry and industrial unions on the theory and practice of collective bargaining, a false tension has been created between bargaining and professionalism. As a result, many practitioners view anything falling outside of contract negotiations and contract enforcement as threatening to the bargaining process. However, professional work is distinguished from nonprofessional work by the high degree of discretion indi-

vidual practitioners have with respect to their work. This condition of work has important and largely unexplored implications for bargaining. As Eliot Freidson, an eminent authority on professions in the United States, notes:

...it is precisely at least partial success in withholding that prerogative [the determination, control, and evaluation of the work to be done] from management and in sustaining the cognitive authority to exercise it themselves that distinguish the professions from other forms of labor in the United States today. To my mind, it is the essence of professionalism, to be treasured and expanded rather than to be deprecated and cast away. This means that if professionalism is to guide the tactics of collective bargaining, the prime goal should be to win greater opportunity for



professionals to choose and control their own work, and greater influence by practitioners on the allocation of the resources that limit the work they can do. (Freidson, 1987).

Beyond the difficulty in reconciling traditional collective bargaining with the context of professional work, local Associations must confront some potentially thorny labor relations issues. A growing number of managers, employees, and union officials in both the private and public sectors view employee participation programs as a cure for the ills of the American workplace. Alienation, low productivity, and poor product quality are frequently mentioned in this regard. Critics maintain, however, that participative programs are often introduced with more of an emphasis on increased profits or lowered costs than on increased satisfaction.

To a large extent, some labor organizations' resistance to the concept of employee participation has its basis in the problems they have already encountered with such efforts. Hidden managerial agendas, severely limited opportunities for employee decision-making (the trappings but not the substance of participation), and inadequate resources to support program efforts are among the barriers to success that have historically plagued participative efforts.

Yet, in many instances, programs fail because participants are unaware of the

conditions demanded by participative efforts. The requirements of traditional collective bargaining are separate and distinct from the requirements of employee participation programs. The latter demand something new:

- They demand knowledge of organizational dynamics.
- They demand new organizational cultures.
- They demand new technical knowledge.
- They demand new roles for members.
- They demand the expansion of the concept of member advocacy.
- They demand new decision-making structures.
- They demand new attitudes.

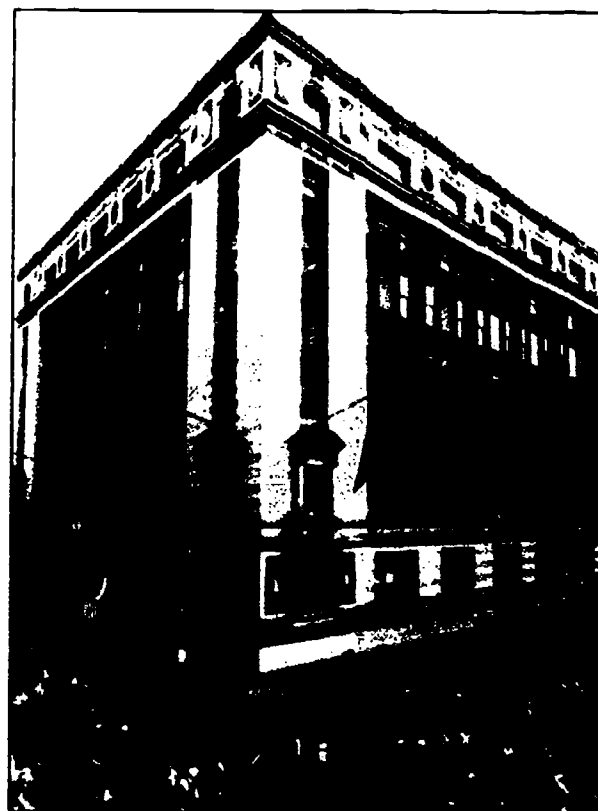
If participative programs are to be successful, local Associations must be cognizant of their potential pitfalls, advantages, and structural requirements. In the following pages, employee participation programs are considered in historical, theoretical, and practical terms. It is our hope that the information contained herein can provide Association leaders and bargainers with the knowledge required to arrive at policies appropriate for their individual situations.

Employee Participation: An Historical Note

The United States has had almost 90 years of experience with various forms of employee participation. One of the first known programs began in 1898 when employee representatives of Filene's department store in Boston were given control of the cafeteria and some employee funds. Fifteen years later, the Packard Piano Company adopted a plan that called for a house of representatives to represent workers, a senate to represent foremen, and a cabinet to represent top management. In order for a proposal to be sanctioned, it had to pass all three houses (Frieden 1980).

During World War I, the National War Labor Board encouraged the development of shop committees and works councils to improve productivity. Between 1918 and 1919, 225 shop committees were set up in 176 companies employing a total of 450,000 workers. While many plans were abandoned after World War I, the 1920s witnessed the rapid spread of shop committees and other employee representation plans through such industries as railroads, printing trades, upholstery, carpet weaving, hats and caps, glass, clothing, textiles, and construction. At its 1926 convention, the American Federation of Labor endorsed these cooperative efforts found among its affiliated unions (Cohen-Rosenthal and Burton, 1987).

Shop committees declined in importance during the 1930s, only to spread throughout American industry during World War II. Approximately 5,000 labor-management committees were set up in factories, mines, and shipyards employing over seven million workers. Committees discussed productivity schedules, product design, maintenance, and labor issues such as child care, car pools, training, health and safety, and absenteeism. The critical short-



Filene's Boston Store

age of labor coupled with wartime demand encouraged committees to consider the question of worker satisfaction. The labor surplus at the war's end and slackening product demand led to a reversal of the trend toward participation (De Schweinitz, 1949).

Beginning in the early 1970s, a new wave of worker participation efforts swept the U.S. *Unlike earlier efforts in which workers were represented by other workers, contemporary efforts involve workers directly in decision making.* U.S. workplaces have been witness to an explosion of new forms of work organization. Program names include: Quality of Work Life (QWL); Quality Circles (QC); Industrial Democracy (ID); Organizational Development (OD); Employee Involvement (EI); Labor-Management Participation



Teams (LMPT); Workplace Participation (WP); Co-determination; Socio-Technical Systems (STS); and Relations by Objective (RBO).

The work organization reform efforts of recent years are in part a response to two principal concerns of American managers. First, they represent a response to the frightening degree of employee dissatisfaction that marks the 1970s and 1980s. Both the lack of control employees experienced with respect to their jobs and the lack of intrinsic meaning the jobs held for them were chief among the causes of dissatisfaction. *Work in America*, a landmark study conducted under HEW auspices in the early 1970s, indicated that the need to do meaningful work was ranked very highly by American workers (U.S. Department of Health, Education, and Welfare, 1973). Employee participation programs, which encourage employee input and decision making, were seen as a means to eliminate the roots of alienation.



Somewhat related to this, employee participation has been seen by many managers as a vital means to reverse the financial decline many companies have experienced as a result of shifting markets and heightened competition. New forms of work organization permit companies greater flexibility in dealing with rapid product and production changes. Additionally, they hold out the promise of increased productivity and more effective use of human resources.

According to U.S. Department of Labor information, over 35 AFL-CIO unions in both the public and private sectors, the International Brotherhood of Teamsters, and affiliates of the National Education Association are involved in employee participation efforts (U.S. Department of Labor, 1983). The number of companies with participative programs is already large. Programs exist in industries as diverse as auto, steel, concrete, wood, paper, defense, textiles, mining, and food processing. A 1982 New York Stock Exchange study revealed that 44 percent of U.S. companies with more than 500 employees had quality circle programs. Almost 75 percent of the companies surveyed had started their programs after 1980. At least one-third of the Fortune 500 companies have QC programs somewhere in their structures.

In the public sector, participative programs currently involve police, firefighters, sanitation workers, bus drivers, teachers, and education support personnel. The diffusion of employee participation programs in the public sector has been somewhat slower than in the private sector. In recent years, however, both a dwindling resource base and concern with the efficient and effective delivery of services have been major forces behind the introduction of numerous employee participation programs in state and local governments.

Employee Participation Programs in Education



Although some aspects of employee participation programs in education have their roots in private sector philosophies and practices, the concept's history in education is distinct enough to be accorded separate treatment. The first gleanings of faculty involvement in decision making are found in the lab schools that came out of Dewey's Progressive Movement. The schools' affiliation with university education departments encouraged innovations in curriculum, pedagogy, and school organizations. Collegiality, which fostered the transmission of knowledge among teachers and promoted innovation, was a distinguishing characteristic of lab school organization. Lab schools had an important impact on university educators and educational researchers. Their influence on mainstream school organization was considerably less.

The first serious cracks in public education's bureaucratic armor appeared in the 1940s with a wave of attempts by administrators to involve faculty in the decision making process of individual schools. These efforts were in part a product of the early human relations movement in American management.

In contrast to coercive or authoritarian management styles, the human relations school emphasized the cooperative nature of organizations and the role of management in fostering cooperation among a firm's employees. Elton Mayo and Chester Barnard are widely considered the movement's philosophical founders. Because their work colored so much of the thinking of the human relations school at the time of its introduction in educational administration, we will take a brief look at it.

As a result of some startling outcomes generated by experiments conducted at Western Electric's Hawthorne, Massachusetts, plant in the late 1920s, Elton Mayo broke decisively with Frederick Taylor's management model. The latter had dominated management thinking in both industry and the public schools for well over a decade. Unlike Taylor's management model, which relied heavily on the concept of the wage-maximizing individual, Mayo emphasized the individual worker's desire for acceptance by his or her peers, the role of sentiment, and the instinct of human association. Management's role in Mayo's model was to provide an environment in which workers could fulfill their natural desire for cooperation (Perrow, 1979).

Coming at the same problem from a different angle, Chester Barnard viewed organizations as cooperative, not coercive systems. In Barnard's perspective, subordinates granted superiors the authority to make decisions. Securing the consent of subordinates to be managed was thus a vital part of management's responsibility. Like Mayo, Barnard saw informal groups as critical to the functioning of formal organizations. Informal groups played an important role in intraorganizational communication and in encouraging organizational cohesiveness.

At the time the human relations movement first touched education some ten years after its acceptance in the private sector, public schools had had about thirty years of scientific management concepts and practices. Rigid, authoritarian structures and highly formalized control systems characterized management in many of the nation's public schools. The human relations movement had a softening influence on these structures. The ideas found visible expression in faculty advisory committees



as well as in a host of informal mechanisms designed to diminish the social and emotional distance between teachers and administrators.

The creations of the early human relations movement such as faculty advisory committees are still to be found in schools today. Despite the change in managerial emphasis, however, the early human relations movement in education (as in the private sector) often had the trappings but not the substance of faculty involvement in decision making. *Its predominant emphasis was consultation, not participation.* Manage-

ment continued to have sole responsibility for directing school operations. What the early human relations approach did was to raise managerial consciousness about the importance of the work culture and informal groups. It focused on the nonrational informal aspects of the organization while scientific management focused on the rational, formal aspects of the organization. However, the emphasis of both perspectives was the control of employee behavior and not the transformation of school organization.

What distinguishes earlier attempts at faculty involvement in decision making from many contemporary efforts is the latter's emphasis on *direct participation*. While most of the site-based participation programs in public education date from the early 1980s, there are notable exceptions. During the 1960s, the Wisconsin Research and Development Center for Cognitive Learning at the University of Wisconsin introduced Research and Instruction Units into several public schools. According to project literature:

The essence of the Research and Instruction Unit is the reorganization of the school. New relationships are established among central staff members, subject matter consultants, building principals, teachers, and noncertified personnel (Smith and Klausmeier, 1967)

School personnel cooperated with Research and Development Center staff to design programs that were appropriate for their schools. Within schools, Research and Instruction Unit members relied on teamwork among themselves to develop both an improved instructional program and the continued improvement of the program (Smith and Klausmeier, 1967).

Current school-based improvement efforts have been given their impetus by private sector workplace initiatives, the re-



search on effective schools, and declining public confidence in education. Mounting external and internal pressures for change have forced many within the educational community to address the inadequacies of the organization of the learning workplace. Chief among these is the faculty's lack of involvement in the decisions that affect their working lives.

In *The Conditions and Resources of Teaching*, a 1985 national survey conducted by the National Education Association, teachers were asked about their involvement in decision making in the school buildings. Those surveyed were asked nineteen questions, covering four major areas. These included: teachers' own assignments, instructional issues, student-related policies, and general school policies. On only one question—How to teach—Did at least half of the teachers surveyed feel that their participation in decision making was adequate. Insufficient opportunity for teachers to make decisions combined with severe resource problems at the school site creates an unhealthy working environment.

According to research conducted by John Goodlad and his colleagues, the degree of staff cohesiveness and the nature of problem-solving and decision-making climates within the schools were highly related to teacher satisfaction. Conversely, interpersonal conflicts and inadequate resources, in part a function of faculty input, were chief among the reasons why teachers chose to leave their jobs.

The idea that teachers' job satisfaction is directly related to their relationships with their colleagues and administrators is not a new one. In the 1950s, a number of studies were conducted in the United States linking teacher morale to these factors (NEA Research, 1964). What is relatively recent is the recognition that *the organization-*

al conditions that engender greater satisfaction among teachers also contribute to the educational process (Dembo and Gibson, 1983; Rosenholtz, 1985; Wynne, 1981; Little, 1982). Goodlad and his colleagues found strong evidence of a relationship between the quality of the school and classroom environment and the quality of education.

Examples of some programs designed to more directly involve teachers in decision making are described below. Programs in public education are most often concerned with one or more of the following: increasing opportunities for collegial interaction, improving teacher-administrator communication, and giving school faculties an opportunity to participate in making decisions that affect the school as a whole.

1. Denver, Colorado

In 1967, the Denver Classroom Teachers Association and the Denver Public Schools established a comprehensive building-level committee program. The parties' collective bargaining agreement sets forth



the program's philosophy, committee composition, election rules, and release time for committee members. In addition, the agreement suggests areas of common concern to both labor and management (Dunlop, 1986).

2. Seattle, Washington

For the past several years, Seattle teachers have had an active Employee Involvement program. According to Seattle Education Association (SEA) President Carol Reed, the program was started in part because the local Association found itself spending an inordinate amount of time putting out fires. The Employee Involvement program represented a means by which people in the buildings could effectively deal with their problems on their own and thus free the local Association staff and leadership for more positive and productive activities.

In the first phase of the program, SEA and the district negotiated a provision whereby individual teachers would receive \$250 to be used toward the purchase of educational supplies or materials.

A second component of the program concerned special educational projects. SEA and the district negotiated a sum of money to be used for this purpose at each school site. Through the special projects program, faculty at the schools conduct additional programs for additional compensation. Individual projects are approved by elected groups of faculty at the school sites. With salaries decided at the state level, the special projects program is one means by which teacher compensation can be enhanced.

More recently, as a result of negotiations with SEA, the district earmarked \$3 million to help at-risk children. Monies are

distributed to individual schools by a weighted formula in which schools with a high proportion of special needs students receive a disproportionate amount of available funds. Depending upon the size of the school, decisions regarding the disbursement of funds are made either by elected faculty representatives at the school site or by the whole faculty. For the most part, the funds are used to pay the salaries of additional faculty (a school psychologist and school nurse are examples of additional faculty hired under this program). When funds are insufficient to hire additional faculty, educational materials geared to the needs of at-risk children may be purchased.

Finally, ten schools in the Seattle district currently have institutional building-based management programs. An additional seven schools are slated to join their ranks next year. In these schools, faculty make decisions about the curriculum, the monitoring of classes, how to best meet the needs of at-risk students, and school discipline policies—to name some of the areas of decision making. Principals serve as facilitators.

All areas of Seattle's Employee Involvement program are covered by contract language. Without good contract language, it is conceivable that programs can be changed or abrogated without consultation. Carol Reed's comment on quality circles is instructive in this regard:

If an innovation like that is to last, you have to build it into the structure of employer-employee relations—through a collective bargaining contract, if that's what the members decide they want (Needham, 1987).

3. Fairfax County

Faculty/Staff Advisory Councils in Virginia's Fairfax County provide a line of communication between program managers and staff. Composed of three to seven





members elected by secret ballot, the Advisory Councils meet a minimum of four times a year (Dunlop, 1986).

4. Teamwork Approach to Better Schools (TABS)

With help from the NEA-IPD cooperative grant program, in 1985 the Orange County Classroom Teachers Association (OCCTA) in Orange County, Florida, created a formative assistance program in five schools. Called the Teamwork Approach to Better Schools (TABS), the program is designed to foster the establishment of formalized teacher support networks within the district.

In the first year, teams were established in five schools (a high school, two elementary schools, a junior high school, and a vocational school). To facilitate team building, the volunteers chosen to become team members received two days of training in which literature on effective schools, quality circles, and cooperative learning was reviewed. Teams went back to their respective schools and over the succeeding five months hammered out the operating details of individual programs, which included such diverse foci as the curriculum and school discipline.

After one year, TABS teams report the following changes in school buildings: reduction of teacher isolation, increased communication, learning expansion; smoother student transitions between elementary school, junior high school, and high school; and improved grades and student behavior. In the coming months, TABS is likely to expand to include more schools and to involve more teachers within each school (NEA-IPD, 1986).

The Orange County program is not covered in the collective bargaining agreement. Strong support from Orange County's assistant superintendent has rendered contract coverage unnecessary up to this point. The program has resulted in contract improvements, however. According to Orange County's UniServ Director John Robinson, the Association has been able to expand the scope of negotiations as a result of the more positive climate that exists between the district and the Association.

In Knox County and Giles County, Tennessee, school site committees composed of the principal and several faculty representatives consider improvements in



such areas as in-service plans, the curriculum, discipline policies, the physical plant, and other items of interest.

At one of the two local Associations in Louisiana with a TABS program, a committee of faculty volunteers has attempted dramatic improvements in a school's playground facilities. The committee has enlisted support from the local government, the school board, and the business community. Thus far, the committee's efforts have been rewarded with improved soil drainage and a new soccer field.

From the perspective of the Association, one significant outcome has been the growing interest of nonmembers and previously inactive members in the Association. While more research is clearly necessary, it does appear that the building level programs have led to membership growth and greater membership involvement. Additionally, these programs have given the Association high visibility and direct input in the day-to-day concerns of teachers.

5. Mastery in Learning Project

The NEA's Mastery in Learning Project (MILP) offers one of the best examples of Association involvement in teachers' day-to-day activities. Started in 1985 with six pilot schools in five states, the Project has expanded to include twenty-seven schools in nineteen states. Briefly, the Mastery in Learning Project is a school-based program designed to encourage mastery in learning, teaching, and curriculum.

- Mastery in Learning implies the facility and confidence, judgment and strength, and command of knowledge and skills achieved through education.

- Mastery in Teaching means going beyond mechanistic rote schooling. It means cultivating higher order thinking, particularly the abilities to analyze, critique, and synthesize.
- A curriculum that encourages mastery helps students see interrelationships across themes, issues, and subjects.

MILP seeks to encourage mastery through faculty involvement in decision making. According to Robert McClure, the Project's director:

Teachers, parents, students, and the public are losing the feeling of ownership of schools. The Mastery in Learning Project can reverse that unfortunate trend by empowering teachers and others at the school to use research knowledge to make choices for what's best for children.

Both the accurate description of conditions at the school level and the diagnosis of problems are critically important for goal setting and the design of effective building level programs. MILP schools have an advantage over many other programs in this respect. Before actually implementing a program, administrators and staff in the targeted schools complete a School Profile and Faculty Inventory, instruments special-



ly developed by MILP staff to provide accurate descriptions and needs assessments for project participants.

The Faculty Inventory relies on a comprehensive survey instrument to produce focused information on teaching and learning conditions at the building level. Four structured activities help faculty members identify their similarities and differences, as well as their priorities and aspirations. The Faculty Inventory begins the process of building collegiality and initiating Project goal setting.

The School Profile describes the school on the day the project begins. Information contained in the School Profile is derived from structured interviews with representative students, teachers, principals and other site-based administrators, parents, and central office staff. Profiles are organized around four basic foci: Teachers and Teaching, Students and Learning, Curriculum, and School/Faculty. Profiles present overviews of school programs, resources, and organizations to education employees, administrators, and community members.

One of MILP's most important features is bringing the fruits of educational research to educational practice. In implementing Project goals, participants can draw on the knowledge and experience of site-based consultants, a network of regional labs and education research institutions, a computer database (Teaching Resources and Knowledge/TRaK), and Project staff.

According to Project staff, responses from individual schools have been more than encouraging thus far. MILP has produced changes in teacher and administrator attitudes, stimulated the use of the research base for teaching, and opened up teacher-teacher, teacher-administrator networks. Individual schools are now in the process of formally documenting the nature of changes taking place.



6. Des Moines, Iowa

One of the more ambitious employee participation programs in public education is located on the campuses of the Des Moines Area Community College (DMACC). In 1982, DMACC management administered the General Motors Quality of Work Life survey to DMACC employees. Survey results showed that almost two-thirds of DMACC employees were unhappy with their jobs.

To remedy what was perceived as a widespread problem, DMACC management implemented a quality circle program. Seven circles were started in 1983. In the spring of 1985, 17 circles were in existence on DMACC's campuses. Circle members include faculty, classified staff, and first line supervisors.

Out of 25 presentations made to management by circle representatives between October 1983 and December 1985, 16 were approved, three were rejected, and six required no decision from management. Half of the presentations made to management resulted in improved services to students. Others have contributed to improving services to staff and improving work-site conditions.



Group problem-solving activities have improved communication within work groups and between departments; increased understanding of institutional policies and procedures; encouraged participation in the decision making process; increased employee skill in problem solving; and improved relationships between circle employees and management.

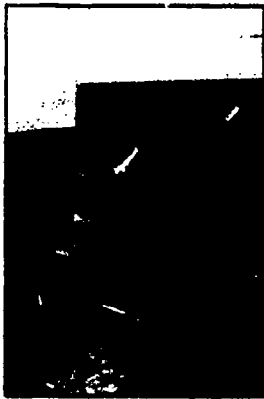
At the top of the quality circle program is the steering committee composed of top level management, Association leaders, and the quality circle facilitator, who is also selected by the committee. In addition to selecting the facilitator, the steering committee approves a budget and monitors circle expansion and training. The facilitator promotes the program, provides training in problem-solving techniques, and works with circle members and circle leaders. The facilitator is the primary conduit of infor-



mation between circles and the steering committee, and the liaison between individual circles and their respective managers.

In addition to quality circles, the DMACC program includes verteams. Verteams are ad hoc committees made up of employees from all levels of the organization. Unlike quality circles, the specific problems they address are identified by management. And, unlike quality circles, which are advisory, verteams have the power to make decisions. Members are trained by the union facilitator. After dealing with the individual problems they have been formed to address, verteams disband.

To minimize conflict and maximize effectiveness, DMACC's employee participation program is governed by a fairly elaborate set of bylaws that spell out the program's purpose, policy, objectives, and organization (Israel et al., 1986).



7. Ventures in Good Schooling

Ventures in Good Schooling is the product of a joint effort between the National Education Association and the National Association of Secondary School Principals (1986). Although not an actual program, *Ventures* provides us with a cooperative model for secondary schools and so is presented here. The general guidelines contained in this document have relevance for all cooperative efforts in public education.

According to the NEA/NASSP Task Force that produced the document, the focus of education reform must be the individual school. The Task Force further indicates that the improvement of education depends upon decisions and actions at the school site. In good schools, staff members develop and utilize shared goals and have high expectations for instructional outcomes. Management practices in such environments encourage staff members to improve their professional skills.

In good schools, principals encourage faculty decision making. Ample opportunity is provided for teachers to plan programs, to refine and develop the curriculum, and to meet and discuss program implementation. Decision making at the school site is the heart of the cooperative model presented in *Ventures*. As the report states:

The NEA and NASSP remain committed to the principle that substantial decision-making authority at the school site is the essential prerequisite for quality instruction.

8. Hammond, Indiana

Following the success of three site-based management efforts, in 1985 the Hammond Teachers Federation and the school district negotiated contract lan-

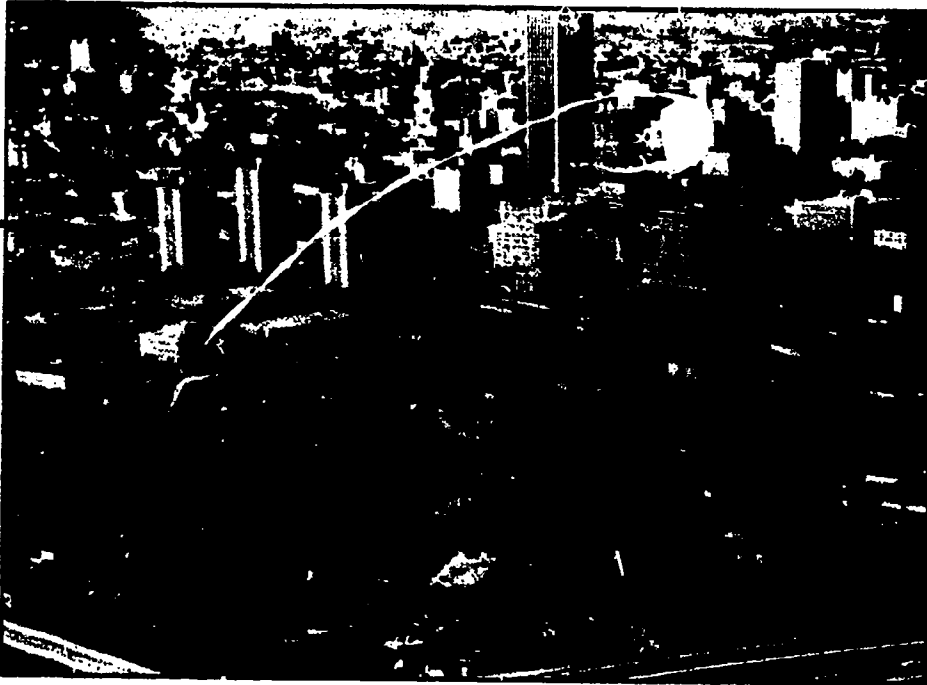
guage, outlining the authority and procedures for a citywide School Improvement Process (SIP).

Decisions once made by the district's central office are now being turned over to individual schools. School site committees composed of teachers, administrators, and community representatives now make critical decisions affecting school operations. If they choose, SIP committees can decide on the disbursement of funds received by each school instead of allowing the building administration to have unilateral discretion in this matter (McPike, 1987).

The Hammond program has strengthened rather than weakened collective bargaining in the district. According to Patrick O'Rourke, the president of the Hammond Teachers Federation:

The SIP process we've put together, since it is decentralized decision making, makes it possible for more teachers to exercise their judgment as to what they think is best for themselves and their school, while still retaining the strength that can only come through a master contract. Don't forget, this is not a rejection or a weakening of collective bargaining, but rather an expansion. We negotiated language in our master contract—which was overwhelmingly ratified by teachers—that sets forth the purpose and procedures of SIP. In so doing, we have indirectly but quite dramatically expanded the scope of what is bargainable (McPike, 1987).

In the event that a school-based decision conflicts with a school board policy, a systemwide review council composed of teachers, administrators, parents, and community representatives meets to see if the SIP proposal can be accepted. When a SIP proposal constitutes a violation of state law and the SIP committee is convinced the proposal will result in increased educational effectiveness, the district has promised it will attempt to get a waiver from the state to allow the proposal to be implemented (McPike, 1987).



9. Program Possibilities

The examples presented above by no means exhaust all possible forms of labor-management cooperation in public education. With respect to scope, programs might address issues related to the school curriculum, textbook selection, school grading policies, and opportunities for professional development. Programs can be structured formally or informally. They may be governed by the collective bargaining agreement or past practice. Labor-management structures may be purely advisory in nature or have some decision making responsibility.

As a general comment, employee participation programs in education hold out the promise of improving instruction. Their continued acceptance depends in large measure on their ability to fulfill this goal. For teachers, the potential gains in job satisfaction and empowerment are enormous. In a larger sense, the success of individual efforts affords all teachers the possibility of meeting some of the more pernicious top-down reform proposals with demonstrably successful site-based alternatives.

Success depends upon local development and local input. Those structures best suited to the individual district or individual school should be developed by representatives from the local Association and management. What works in one district or one school may not work in another district or school. Great attention should be paid to the prevailing style of management and member needs in setting up a program. Experience has shown that the success of a program is related to the structure governing it and the appropriateness of that structure for a particular environment.



Employee Participation and Collective Bargaining

One of the most controversial aspects of employee participation programs in organized settings is the relationship of such programs to the collective bargaining process. In this section, we examine the experiences and philosophies of private sector unions on this subject.

In theory, the structures of employee participation and the collective bargaining process are separate, but complementary. The Statement of Principles on Quality of Work Life issued by the Joint CWA/AT&T National Committee states:

QWL efforts must be viewed as a supplement to the collective bargaining process. The integrity of the collective bargaining process, the contractual right of the parties and the working of the grievance procedure must be upheld and maintained.

Glen Watts, CWA's former president, emphasizes:

Collective bargaining and the grievance process are off limits for QWL; worker participation is a separate process (Watts, 1984).

The *EI Handbook II* distributed by the UAW-Ford National Joint Committee on Employee Involvement quite plainly says:

Right up front we should affirm that EI and collective bargaining matters are separate. If EI Teams raise issues that fall within collective bargaining, the Team leader can pass those on to the responsible supervisor or committee person.

In the view of the International Association of Machinists and Aerospace Workers,

QWL programs are not meant to be used as a substitute for portions of the collective bargaining agreement (IAM, 1984).

According to the United Rubber Workers' 1982 Collective Bargaining Policy handbook,

Make sure that the QWL program does not enter into any area of the collective bargaining agreement. Get solid language to insure against this possibility. This is a good reason why union stewards should be involved in the program (URW, 1984).

Despite the strong statements to the contrary, in practical terms, considerable ambiguity exists about the precise relationship between collective bargaining and employee participation programs. A recent examination of the U.S. Department of Labor compendium of employee participation programs, the *Resource Guide to Labor-Management Cooperation*, revealed that approximately 50 percent of the programs listed dealt with mandatory subjects of bargaining. Over 25 percent of programs for which information was available dealt with these subjects even though they were excluded under program guidelines (Parker, 1985).

When an employee participation program is present, there is a tendency for it to stray beyond its original bounds. In attempting to sustain employees' interest in the program, managers and union facilitators may enter areas covered by the contract. In the event that this occurs, there is the possibility that critical labor relations issues can be transferred from the collective bargaining arena, in which unions have legal rights to the arena of labor-management participation, in which unions have no legal rights.

There is also the possibility that employee participation programs have a constraining influence on the scope of bargaining. Mike Parker, UAW activist and noted QWL analyst, comments:



The areas turned over to QWL are the ones on the cutting edge of labor relations—introduction of technology, work rules, work methods, and even the product or service produced. By allowing the collective bargaining role to be narrowly defined as negotiations for a contract every few years and enforcing the hard rules in contracts which have fewer and fewer hard rules, unions make themselves irrelevant to the concerns of their members (Parker, 1985).

Not all union leaders agree that employee participation weakens bargaining. As John Carmichael, a retired administrative officer of the Twin Cities Newspaper Guild, and Marilyn Taylor, assistant administrative officer of the Twin Cities Newspaper Guild, put it:

We maintain that it (worker participation) is not just a supplement to the collective bargaining process, but a part of it. Through worker participation, we have increased and bettered communication between workers and management, solved problems, introduced innovations, and built a structure that is flexible enough to weather trauma but solid enough to last. Those certainly are aspects of collective bargaining (Carmichael and Taylor, 1984).

For the Communication Workers of America, worker participation has been a useful vehicle for effecting the goals of collective bargaining. Through the intersection of worker participation and collective bargaining, CWA has been able to address such issues as technological change, continuous education, and employment security. In the words of CWA's president, Morton Bahr:

CWA is committed to a cooperative approach to decision making. We see joint action as a powerful and effective tool in these days of rapid changes in technology, shifting social conditions, and uncertain economic prospects. We stand ready to move ahead with companies and managers who share our vision of workplace democracy and mutual respect for each of our organizational needs (Bahr, 1987).

Employee participation programs do have the potential to redefine the role of collective bargaining. Rather than producing rigid organizational systems and well-defined rules for labor-management relations, collective bargaining can, under certain circumstances, become a vehicle to initiate a forum for change and communication between labor and management. As R. I. Kilroy, president of the Transportation Communications Union, told a Railroad Personnel Association annual meeting several years ago:

Through the use of the collective bargaining tool, we feel we can set the stage for success in the use of Quality of Work Life programs. We want to help and to participate, but only if we can know and trust our partners. Again, this means coming to an agreement through the bargaining process. Agreements that clearly spell out the formation of such committees, their purpose, their duration, methods of evaluation, and if successful, how the rewards of that success will be shared by the parties involved (Kilroy, 1984).

The Potential Benefits of Employee Participation

Site-based decision-making programs can serve as an important adjunct to the collective bargaining process. Such programs have the potential to provide local Associations with a mechanism to address issues affecting their members that by statute, custom, or historical accident lay beyond the reach of collective bargaining or grievance processes.

The potential usefulness of employee participation programs in member advocacy has already been recognized by the AFL-CIO. In 1985, the AFL-CIO Committee on the Evolution of Work—composed of 18 international union presidents and officials from eight AFL-CIO trade departments, representing every segment of the labor movement—released *The Changing Situation of Workers and Their Unions*. In this report, the Committee stated:

Many workers, while supporting the concept of organization, wish to forward their interests in ways other than what they view as the traditional form of union representation which is, in their view, an adversarial collective bargaining relationship... There is a particular insistence voiced by workers, union and non-union alike, to have a say in the "how, why and wherefore" of their work. These needs and desires are being met in some cases by union-management programs affording greater worker participation in the decision-making process at the workplace. Several unions have developed such programs and report a positive membership response. The labor movement should seek to accelerate this movement (AFL-CIO, 1985).

Site-based decision-making programs address issues related to job satisfaction and effective performance that either are not addressed or are precluded from being addressed in the collective bargaining agreement. The employee rights established and protected through the collective bargaining process have not to date included the right to do meaningful work, the right to have adequate resources to perform one's job effectively, and the right to participate in the decision-making process around one's job.

For the professional employee, these rights are even more critical to secure than among blue collar workers. The exercise of professional discretion is empty without adequate resources or input in the establishment of school goals and objectives. This is the meaning of professional empowerment. Having the technical ability to perform certain tasks means little unless both the resource and program requirements to support those skills can be met at the school site. A direct relationship exists between professional empowerment and educational effectiveness.

Site-based decision-making programs foster collegiality. They encourage the sharing of professional knowledge among teachers. In this way, they make more effective use of the collective knowledge found in each school. NEA's Principle Five notes:

The legitimate interests of the public are best served by the approaches identified in the effective schools research. These approaches include providing time and resources for the school faculty to plan for instructional improvement and change and professionals working collaboratively to

share knowledge, to improve professional practice, and to reduce individual isolation of teachers.

In this instance, increased educational effectiveness is a direct function of the reduction of teacher isolation.

Site-based decision-making programs permit more frequent communication between the faculty and the administration than does collective bargaining taken by itself. Participative programs encourage *on-going* discussion between labor and management about the needs of employees, the resources required to meet those needs, and the nature of organizational impediments to effective functioning. Collective negotiations, on the other hand, occur only once a year or once every several years. The grievance procedure, which is ongoing, is designed to deal only with contract violations and not with proactive issues.

Site-based decision-making programs involve employees directly in making decisions that affect their working lives and communicating their needs and suggestions to management. This has the potential to make employees more active in their Association, provided the Association maintains a strong presence in the participative program. There is support for this in the private sector. In a study of five organizations in manufacturing, utilities, and publishing, Professor Anil Verma found that:

...EI (Employee Involvement) programs generally have positive outcomes for the union when the union is a joint sponsor of the program. In contrast, when the union remains uninvolved, there appears to be a negative selection effect in that workers less interested in union activity appear to volunteer for such programs.

With respect to collective bargaining, it is possible that site-based decision-making programs may function to constrain the scope of bargaining. However, our examples indicate that site-based decision-making programs can also expand the scope of bargaining. In the case of emotionally charged subjects, site-based teams may provide the only channel of communication initially open to the local Association. Depending on the outcome of informal discussions, these subjects can then be introduced into the negotiation process itself.

The advantages enumerated in this discussion have been couched in terms of possibilities, not certainties. Site-based decision making can lead to greater employee control over workplace decision making or greater administrator control over the bargaining unit. Whether it leads to the former or the latter depends upon the cohesion and sophistication of the local Association, the history of labor relations, the specific actors involved, the true intent of the program, and the resources allocated for its implementation.

Site-based decision-making programs hold risks as well as rewards. In order to minimize the risks, it is important for any local that is considering implementing participative programs to be aware of their potential dangers. In the next section, we review some of the major pitfalls to be avoided.

The Pitfalls of Participation

The greatest dangers of site-based decision-making programs concern the security of the bargaining unit. There is a possibility that the decision-making program will emerge as a substitute for, rather than a supplement to the collective bargaining process. In this instance, the critical decisions affecting the bargaining unit are transferred to the labor-management forum, marginalizing the collective bargaining process.

While the Association will continue to exist as an independent entity, it will no longer have any real authority. In this situation, members will be increasingly likely to identify more strongly with school administrators than with their own organization. The administration will have enhanced its power at the expense of the Association.

Another possibility is that the Association facilitators in charge of the employee participation program will come to think like school administrators and fail to be advocates for their members' interests. The need for financial support from the administration, insufficient Association input into the program, and administration-dominated training are all factors that can contribute to the unholy conversion of Association facilitators.

In the event that facilitators assume administrators' point of view, the division widens between facilitators and grievance handlers, between those most closely involved with site-based decision-making programs and those most closely involved with traditional areas of union activity. This can create serious problems for the bargaining unit in the event that it seeks to establish consensus on difficult issues such as the introduction of new technology or job redesign.

While many employee participation programs have employee satisfaction as their *stated* intent, the *true* intent of the programs may be more traditional management goals. For example, school administrators may wish to secure support for unpleasant, cost-cutting measures. Others may be interested in teacher satisfaction only insofar as it relates to organizational performance. In the private sector, many employers implementing participatory programs assume that satisfaction and productivity are related in a direct, causal fashion (i.e., if you increase satisfaction, productivity automatically goes up). Research on employee participation programs does not support this, however. In a review of hundreds of programs, two researchers found that while under certain conditions increased job satisfaction will enhance productivity, there is no automatic, invariant relationship between the two (Katzell and Yankelovich, 1973).

This raises a number of questions. In school districts where employers are truly concerned with organizational performance and not employee satisfaction, will their support for the program wane if per-

formance doesn't improve? Will they be likely to support only those proposals that save them money or improve productivity and not those that are only concerned with their employees' comfort or happiness?

Critics of employee participation argue that it has been a means for employers to secure employee suggestions without granting employees additional compensation. In the private sector, employee suggestions have resulted in improved product quality, increased productivity, and, not infrequently, layoffs. Labor in this scenario is the senior partner in contributing ideas and resources and the junior partner in reaping rewards from organizational improvements. It is important that this scenario not be repeated with public education.

The final group of potential problems concern the structural limitations of employee participation programs. While viewed as a panacea for everything that ails an organization, employee participation programs often suffer from limited scope, limited resources, and limited diffusion throughout an organization. An imbalance is thus created between proponents' hopes for the program and what can legitimately be expected, given the program's limitations. Over time, the gap between excessively optimistic expectations and disappointing outcomes results in reduced support for the program. Participation in the program likewise declines. Resources, initially insufficient, become further reduced and the program dies a quiet death.

The problems pointed to in this section are possible, not inexorable, consequences of employee participation programs. They can be avoided if local Association leaders are cognizant of the dangers and if they take steps to prevent these potential dangers from becoming reality.

The discussion above underscores the importance of a local Association maintaining its strength and independence when employee participation programs are present. *Independence does not necessarily mean maintaining a hostile relationship.* It can also mean maintaining a strong and independent presence within the context of a cooperative labor-management relationship.

Ironically, assuming a hands-off approach toward an employee participation program can sometimes be more dangerous than getting involved in the program. If a school district succeeds in getting employees interested in site-based decision making and the union refuses to become involved, the employer will have effectively divided employees from their Association. The message we are presenting here is not to shun participative programs but to be smart about participating.

Participation in the Public Sector

Important differences exist in the public and private sector contexts of employee participation. These differences include both advantages and risks for public sector unions. Employee participation programs are intended to enhance the quality of government services. *They are thus concerned with the public, not the corporate good.*

In the private sector, the different interests of labor and management place union facilitators in employee participation programs in a difficult position. If they do not acknowledge the legitimacy of management's motives, they risk losing management's support for the program. If they accept management's motives, they risk alienating their members.

In the public sector, conditions for employee participation are more favorable than in the private sector. Concern with the quality of services competes with concern with the cost of services as a focal point of individual programs. As a result, program goals can be established that are more in consonance with employee motivations.

This statement is not equally true of all public services. Concern with the quality of service is more likely to be the most important issue in those programs in which output cannot be readily measured. Employee participation programs in public education are more likely to be directed toward the quality of service than are employee participation programs in sanitation, where productivity measures can be more easily applied to program results. Within education, employee participation programs concerned with support functions are more likely to be oriented toward paring expenditures and improving productivity than are employee participation programs concerned with instruction.

It is critical, therefore, that Association leaders accurately assess the bias of

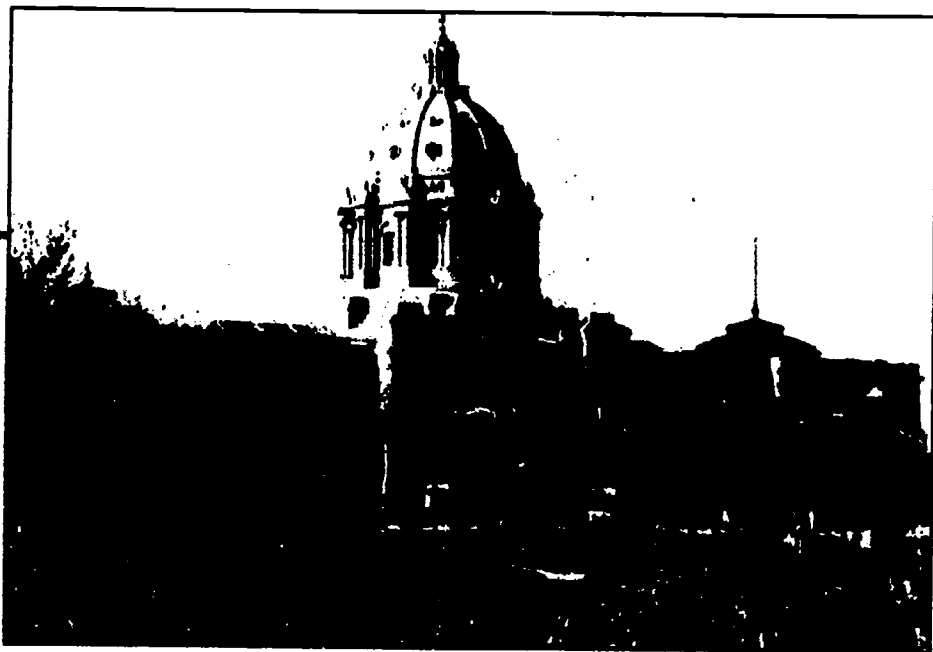
the program. If the true focus of the program is on the quality of a service, there is a strong possibility that the interests of the employees and the interests of management can be reconciled and a stable structure created. The measures taken to improve the quality of service not infrequently involve a positive change in the working conditions of employees.

On the other hand, if the true focus of the program is on reducing expenditures, Association representatives will need to be mindful of the potential problems raised in connection with private sector employee participation programs—job security and the possibility that the administration is using the program to secure employee consent for unpopular managerial decisions (i.e., making employees think like management).

Besides the legitimate interest in the quality of service inscribed in many public sector programs, they have an additional advantage over programs in the private sector. In the private sector, managers answer to company owners. In the public sector, managers answer to elected officials and, hence, are sensitive to public criticism of, or support for their programs and policies. Programs and policies that produce improvements in essential public services are likely to garner support for elected officials and their administrators. Conversely, programs and policies that lead to a deterioration in public services are likely to create public resentment and opposition.

To the extent that the Association can secure public support for its program objectives, it will have a source of leverage with school administrators that private sector unions do not have with their respective managements. This leverage can be used in both the context of collective bargaining and the context of the school site programs.

The structural advantages of employee participation programs in the public sector are muted by some significant disadvan-



tages. In the public sector, employee participation programs require substantial, sustained political support in order to ensure that they receive adequate levels of resources. Securing this support is no easy matter, however. Changing administrations, shifting tax bases, and competing program requirements combine to make sustained support unlikely in many instances. As a rule, the political cycle and the cycle of organizational change do not coincide. Participants in the change process face a fair amount of uncertainty and interruption in establishing new ways of communicating with each other.

Beyond political considerations, employee participation programs in the public sector are disadvantaged by public sector labor law. In many instances, public sector unions do not have agency or union shop recognition. With respect to teachers, for example, agency shop recognition is mandatory in only three states and permitted in only fourteen others. Union shop recognition is permitted in only one state.

When a local does not have agency or union shop recognition, it establishes its membership base and secures its operating revenues by the services it provides employees: negotiating contracts and handling grievances. To the extent that employee problems are dealt with outside regular Association channels, public sector unions will experience difficulty in attracting members. In extreme cases, union members themselves will question the necessity for a

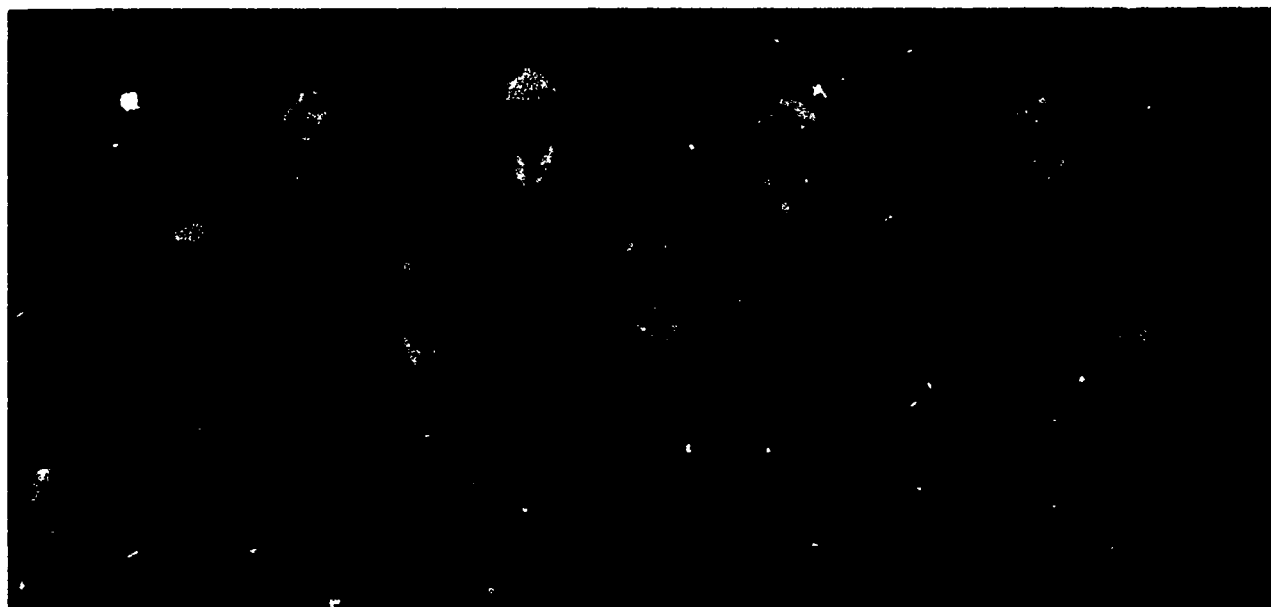
union. A description of a problem encountered in Pima County, Arizona, is contained below.

...over time a number of items (such as the liberalization of reimbursement criteria) were referred from the Meet and Confer to the QWL process and there resolved. The nonaffiliated committee members regarded the gains achieved by the LMQWLC (Labor-Management QWL Committee) as clear evidence that no union was needed in Pima County. Their ability to achieve substantial gains in a pleasant, cooperative atmosphere without paying union dues presented a striking contrast to AFSCME's history of achieving few gains in an unpleasant, adversary atmosphere at a cost to members of 1% of their monthly salary. At a LMQWLC retreat held on September 17, 1982, the nonaffiliated employees openly raised the question: What do we need a union for now that we have QWL? (Showalter and Yetman, 1983)

This problem is no doubt exacerbated by the restrictive scope of bargaining found in most states. The latter has a tendency to force the resolution of problems in participative contexts outside of the formal negotiation process.

In the public sector, the security of the bargaining unit should be a paramount consideration in the design, implementation, and evaluation of employee participation programs. A local Association can cooperate with the administration in pursuing the goals of a decentralized or site-based decision-making program and still can continue to be an effective advocate for its members. However, if the local Association fails either to be an effective advocate for its members or to effectively communicate its advocacy efforts to its members—particularly with respect to employee participation programs—both members and nonaffiliated employees will most certainly question the need for a union.

The Legality of Employee Participation Programs



AP/Wide World Photos

In 1980, the U.S. Supreme Court held that faculty at Yeshiva University were managerial employees and as such were denied collective bargaining rights under the National Labor Relations Act. As the Court concluded:

...the faculty of Yeshiva University exercise authority which in any other context unquestionably would be managerial. Their authority in academic matters is absolute. They decide what courses will be offered, when they will be scheduled, and to whom they will be taught. They debate and determine teaching methods, grading policies, and matriculation standards. They effectively decide which students will be admitted, retained and graduated. On occasion their views have determined the size of the student body, the tuition to be charged, and the location of a school...it is difficult to imagine decisions more managerial than these (U.S. Dept. of Labor, 1986).

In excluding the faculty of Yeshiva University from coverage under the NLRA, the Supreme Court reversed a 1975 NLRB

decision. Earlier, the board had held that professional employees engaged in predominantly intellectual work who were required to exercise independent professional judgment were protected from supervisory status under the NLRA. In addition, it held the definition of a supervisor exempted "collective membership" in the form of advisory bodies from supervisory or managerial status (Iorio, 1987).

The Court's decision sent shock waves not only throughout the higher education community, where organizing has been sharply affected, but also throughout the unionized workforce. The question raised in this connection is whether substantial involvement in workplace decision making forces employees to give up their right to bargain collectively. It is not within the scope or authority of this publication to resolve this issue. We can, however, present the basic considerations surrounding the issue to encourage further discussion, debate, and strategizing.

Perhaps the most salient aspect of the Yeshiva University decision is the contro-

versy surrounding it. The decision has come under sharp attack from the nation's leading labor relations scholars and legal experts. As Harvard's John Dunlop pointedly noted at a conference marking the NLRA's fiftieth anniversary:

...take the Yeshiva doctrine that some faculties are so arranged that every tenured faculty member so participates in some decisions of management that collective bargaining should be denied to all. The Supreme Court defined managerial employees as those who "formulate and effectuate management policies by expressing and making operative the decisions of their employer by taking or recommending discretionary actions that effectively control or implement employer policy." Gobbledygook. Such phrasing needs to confront the tests of reality with real persons in real time. The transfer to the academic or to the medical care worlds of the industrial plant model of supervision of hiring, promotion, and discharge yields results that defy practical experience (Dunlop, 1985) (emphasis added).

Dunlop's comments are given support by Eliot Freidson in his work, *Professional Powers*. Freidson notes that the technical autonomy of professional work creates ambiguity in professionals' positions within the firm. Because of the discretionary nature of their work, professionals are virtually required to perform many of the tasks that in an industrial setting are performed exclusively by managers. As a result, managers and supervisors in professional settings are precluded from performing the same tasks that they perform in industry (Freidson, 1986).

James Begin and Barbara Lee, professors of labor relations at Rutgers University, feel strongly that the Yeshiva decision is unduly harsh with respect to professionals:

...the law [the current interpretation of the NLRA] undervalues the right of professionals to bargain over their employment in-

terests, and it overvalues the nonproduction decision-making activities of these employees by assuming a conflict of interest between bargaining and participation in organizational decision making (Begin and Lee, 1987).

The comments above can be viewed as evidence of a growing movement to deal legislatively with the obstacles to labor-management cooperation created by the Yeshiva decision. Curiously, the exact parameters of the Yeshiva decision remain indeterminate, even though almost seven years have elapsed since it was handed down. NLRB and circuit court decisions are inconsistent and irreconcilable (Rabban, 1987). In 1984, in *Loretto Heights College v. NLRB*, the U.S. Tenth Circuit Court of Appeals held that even though faculty members helped to formulate and effectuate management policy, their role did not rise to a level of "effective recommendation or control." As a result, they were not considered managerial employees and were therefore entitled to collective bargaining rights under the NLRA (U.S. Dept. of Labor, 1986).

The Supreme Court decision could play a significant role in the interpretation of state bargaining statutes (Jascourt, 1987). On the other hand, while a number of state statutes are modeled after the NLRA, suggesting the transfer of the Yeshiva decision to the public sector, some public sector statutes explicitly set out what is not bargainable as well as what is bargainable. Since state statutes delineate the area of "management rights," the kind of situation that led to the Yeshiva decision is less likely (although not impossible) (Margolies, 1987).

The Yeshiva University decision has been invoked by management in five public sector cases in the United States in order to



deny bargaining rights to professional employees. Four of the five cases concerned higher education faculty (at Wichita State University, the University of Alaska, Southern Oregon State College, and the University of Pittsburgh). The remaining case involved doctors at D.C. General Hospital. In only one of the five cases (the University of Pittsburgh) has the *Yeshiva* decision been found applicable. A hearing examiner of the Pennsylvania Labor Relations Board found that 1,600 University of Pittsburgh professors are managers. The professors' organization, the United Faculty, is planning to appeal the hearing examiner's decision. It is important to note that the only public sector case in which the *Yeshiva* decision has been found applicable concerns higher education faculty. With minor exceptions, unfavorable private sector determinations have invariably related to higher education faculty and have had as their basis the wide latitude in policy questions given to faculty in the college or university governance process.

At the minimum, when the *Yeshiva* decision is applied elsewhere in the public sector, it *will have widely varying limits of applicability* with respect to individual states and individual groups. In the shuffle, public school teachers are in good shape to withstand legal challenges. To quote George Margolies, legal counsel to the superintendent of the D.C. public schools:

School boards need not abdicate responsibility vested in them by statute and

regulations in order for teachers to have an increasing voice in shaping new programs and policies at the local school level. Unlike the governance structure of Yeshiva University, elected boards of education would not be ceding final authority for making policy judgments (Margolies, 1987).

Finally, when an organization seeks to legally exclude employees from bargaining with it, one would have to conclude that a hostile relationship exists between a union and an employer. The reality is that this is the rare exception rather than the rule. Despite the enormous number of programs that exist in the private sector, only a very small number of cases have actually been brought to the NLRB. Additionally, even though unions are within their rights to claim that a participative program constitutes employer domination of a labor union, very few actually have. When employers and employees have a program that has improved their relationship and improved their effectiveness, it is absurd to think that either party will seek to destroy the relationship by seeking hostile, legal remedies.



Some Conditions Are Better than Others

Some conditions are more likely than others to engender a successful employee participation program. Here we present a series of issues for local Associations to address with respect to whether they should become involved in a site-based decision-making program.

First, site-based decision-making programs make a great deal of sense when there are significant internal or external pressures for change in the Association's relationship with the administration (Kochan, Katz, and Mower, 1985). Examples of internal pressures include member demands for improvement in the quality of work life, increased interaction with their colleagues, or the need for more effective communication with administrators. Examples of external pressures include educational reform initiatives and radical shifts in either district revenue or the local demand for services. In many cases, such pressures are difficult to accommodate within the context of an existing collective bargaining relationship.

Second, site-based decision-making programs have a much better chance of success if the administration's principal motivation for participating in a site-based program is to improve school effectiveness as opposed to reducing operating costs. If the administration's principal desire is to reduce costs, the Association must obtain adequate job security guarantees to protect members against any reductions-in-force



that could arise from member suggestions. In the event that job security guarantees cannot be obtained, the program could pose a threat to the membership base of the local Association.

Third, site-based decision-making programs stand a much better chance of succeeding when the Association is a full partner in the program. Do not allow management to design, implement, and evaluate the program without Association input. This poses too great a threat to the security of the bargaining unit to warrant the benefits such a program might have for the Association.

Fourth, the program must be ensured adequate support. If possible, funding should be guaranteed for at least five years in order to come to terms with the discrepancy between the political cycle and the cycle of organizational change. In implementing a site-based decision-making program, an Association is initiating cultural change within a school building or school district. Changing the customs and practices of an organization takes a great deal of time and sustained support.

Guidelines for Local Associations

If your local Association is involved with site-based decision making, we suggest that you consider the following items: First, participation in site-based decision-making programs should be voluntary. Mandatory participation could possibly engender hostility toward the program and thus subvert its aims.

Second, successful programs require the support of both the leadership of the local Association and the district administration. To facilitate program implementation at the building level, it is important that the Association leadership and the district administration come to agree on the program's basic goals and processes as well as the level of resources required to support program activities.

Third, if a program involves faculty representation as opposed to direct faculty participation, it is advisable that Association representatives on building committees be elected rather than appointed. As Neal Herrick, a leading authority on public sector employee participation programs, comments:

The general principle to keep in mind is this: in order to integrate the interests of the various groups in the workplace, representatives must serve at the pleasure of their constituencies. A sanitation worker, for example, cannot be expected to represent the interests of other sanitation workers simply because they share the same position classification. If appointed by the president, the worker will serve the union president's interests (Herrick, 1983).

Fourth, the relationship between collective bargaining items and the issues dealt with at the school site should be clearly defined. It is generally not advisable to permit collective bargaining items to be introduced in the site-based decision-making program.

Fifth, because even in the best of circumstances conflict may arise between the master contract and proposals emanating from the school site, review and redress procedures should be implemented at the program's outset.

Sixth, programs need to be evaluated at regular intervals by the local Association. Both the effectiveness of the program's structure in meeting program objectives and the early detection of structural problems should be examined on a regular basis.

Seventh, members should be educated about the possible dangers labor-management programs pose for the health of the local. In addition, the local leadership should make it a point to communicate regularly with the membership regarding program gains and problems.

Eighth, the local Association should take an active role in the development of training materials and in training participants. In the private sector, many participative programs have gone awry because of the lack of union involvement in this phase of development.

Summary Implications for Local Associations

- Seek the benefits of participation when conditions merit it.
- Maintain awareness of the problems that could arise in connection with employee participation programs.
- Make sure your members want to become involved. Don't force an employee participation program on them. Let the program flow from their needs and interests.
- Maintain your independence. Advocacy is no less important in the participative context than it is in collective bargaining.
- Establish a clear relationship between collective bargaining and the site-based decision-making program. Site-based decision making must supplement, not supplant collective bargaining.
- Determine management's real motivation for being interested in participation. If it is legitimate, support the program. If it is not, educate your members about the problems as you see them. They won't go away by themselves.
- If you decide to become involved, get involved on the ground floor in determining the program's structure and developing training materials.
- Evaluate programs at regular intervals to see if problems are developing. Mid-course corrections may be necessary in a program's scope, goals, and structure.
- Establish reasonable expectations for the program. Change takes time and adequate resources.
- Make sure the program has adequate support.

References

AFL-CIO Committee on the Evolution of Work. *The Changing Situation of Workers and Their Unions*. Washington, D.C.: AFL-CIO, 1985.

American Federation of State, County and Municipal Employees. "Worker Participation in the Public Sector." *Labor-Management Cooperation*, pp. 57-58. Washington, D.C.: U.S. Department of Labor, 1984.

Bacharach, Samuel B., and Edward J. Lawler. *Bargaining: Power, Tactics and Outcomes*. San Francisco: Jossey-Bass, 1981.

Bahr, Morton. Speech given at Ecology of Worklife Conference, Washington, D.C., June 26, 1987.

Begin, Janies P., and Barbara A. Lee. "NLRA Exclusion Criteria and Professional Work." *Industrial Relations* 26 (Winter 1987): 83-95.

Blumberg, Paul. *Industrial Democracy: The Sociology of Participation*. London: Constable, 1968.

Boscoe, Simon. "An Analysis of the History of the Scope of Bargaining in the New Jersey's Public Sector as Compared with the Public Sector Models of New York and Pennsylvania." (Unpublished Ph.D. dissertation).

Camens, Sam. "Steel—An Industry at the Crossroads." *Labor-Management Cooperation*, pp. 44-48. Washington, D.C.: U.S. Department of Labor, 1984.

Carmichael, John, and Marilyn J. Taylor. "WL: It's Come a Long Way at the Twin Cities Newspapers." *Labor-Management Cooperation*, pp. 65-69. Washington, D.C.: U.S. Department of Labor, 1984.

Cohen-Rosenthal, Edward, and Cynthia E. Burton. *Mutual Gains: A Guide to Union-Management Cooperation*. New York: Praeger, 1987.

De Schweinitz, Dorothea. *Labor and Management in a Common Enterprise*. Cambridge: Harvard University Press, 1949.

Dembo, Myron H., and Sherri Gibson. "Teacher's Sense of Efficacy: An Important Factor in School Improvement." *Elementary School Journal* 86 (November 1985): 173-84.

Dunlop, John E. "The Increasing Role of School Employees in School Site Decision Making—A National Perspective." Paper presented at the NJEA-IPD Conference in Scanticon, New Jersey, March 7-8, 1986.

Dunlop, John T. "Legal Framework of Industrial Relations in the United States." *Daily Labor Report*, October 7, 1985, pp. E1-E5.

Freidson, Eliot. "The Position of Professional Employees." *Newsletter of the National Center for the Study of Collective Bargaining in Higher Education and the Professions* 15 (March/April 1987): 2-4.

Friedson, Eliot. *Professional Powers: A Study of the Institutionalization of Formal Knowledge*. Chicago: University of Chicago Press, 1986.

Frieden, Karl. *Workplace Democracy and Productivity*. Washington, D.C.: National Center for Economic Alternatives, 1980.

Goodlad, John. *A Place Called School: Prospects for the Future*. New York: McGraw-Hill, 1984.

Guest, Robert H. "Quality of Work Life—Learning from Tarrytown." *Harvard Business Review* 57 (July-August 1979): 76-87.

Herrick, Neal Q. "Organizational Initiation, Maintenance, and Diffusion." In *Improving Government: Experiments with Quality of Working Life Systems*, edited by Neal Q. Herrick, pp. 145-53. New York: Praeger, 1984.

International Association of Machinists and Aerospace Workers. "Quality of Work Life Programs: IAM Research Report." *Labor-Management Cooperation*, pp. 16-21. Washington, D.C.: U.S. Department of Labor, 1984.

als who, though lacking an education degree, may have the experience and expertise to make science and mathematics come to life in the classroom. Evidence from New Jersey and elsewhere suggests--and we in the Department believe--that alternate certification programs could increase the Nation's supply of teachers in science and mathematics. FIRST is currently supporting a study of alternate certification programs, and Programs for the Improvement of Practice (PIP) in OERI is planning a conference on alternate certification to be held in December.

NSF has worked with NCES in developing a number of items for the National Postsecondary Student Aid Survey, which supplies data on students' backgrounds and some of their educational experiences in various fields. The National Endowment for the Humanities, the National Institutes of Health, the Department of Agriculture, and NCES are helping to fund NSF's Earned Doctorates Survey, which indicates the numbers, demographic distributions, and career plans of Ph.D.-earners in various fields each year.

Finally, NCES furnishes a wealth of data on other issues related to mathematics, science, and engineering education--the number of bachelor's and master's degrees conferred in various fields of mathematics, the sciences, and engineering; collegiate enrollments in different fields of study; employment status, earnings, and types of work for bachelor's degree holders in various fields; changes in demand for mathematics and science teachers; changes in high school graduation requirements; characteristics of mathematics and science teachers, including their career histories and plans, degrees earned, number and types of courses taken in mathematics and science, teaching experience, compensation, working conditions, and courses taught; the research and teaching responsibilities of professors, the demographic distribution of science and mathematics faculty in higher education, faculty career paths, their likelihood of leaving the teaching profession.

Mr. Chairman, the Department provides various forms of direct assistance to states and schools in an effort to help them improve teaching and learning in mathematics and science. The Nation's largest program dedicated to that is the Dwight D. Eisenhower Mathematics and Science

Iorio, John E. "The Relevance of Yeshiva to Public Education." *Journal of Law and Education* 16 (Winter 1987): 95-103.

Israel, Cary Dutch Kleywegt and Harriet, Custer. *Quality Circles in Education*. Des Moines: Des Moines Area Community College, 1986.

Jascourt, Hugh D. "The Relevance of Yeshiva to Public Education: Introduction." *Journal of Law and Education* 16 (Winter 1987): 93-94.

Kanter, Rosabeth Moss. *The Change Masters: Innovation and Entrepreneurship in the American Corporation*. New York: Simon and Schuster, 1983.

Katzell, Raymond A., Penny Bienstock, and Paul H. Faerstein. *A Guide to Worker Productivity Experiments in the United States: 1971-75*. New York: New York University Press, 1977.

Katzell, Raymond A., and Daniel Yankelovich. *Work, Productivity and Job Satisfaction: An Evaluation of Policy Research*. The Psychological Corporation, 1973.

Kilroy, R. I. "Cooperative Ventures in the Railroads." *Labor-Management Cooperation*, pp. 16-21. Washington, D.C.: U.S. Department of Labor, 1984.

Kochan, Thomas A., Harry C. Katz, and Nancy C. Mower. "Worker Participation and American Unions." In *Challenges and Choices Facing the American Labor Movement*, edited by Thomas A. Kochan, pp. 271-306. Cambridge: MIT Press, 1985.

———. *Worker Participation and American Unions: Threat or Opportunity*. Kalamazoo, Mich.: W. E. Upjohn Institute for Employment Research, 1984.

Kochan, Thomas A., Robert B. McKersie, and John Chalykoff. "The Effects of Corporate Strategy and Workplace Innovations on Union Representation." *Industrial and Labor Relations Review* 39 (July 1986): 487-501.

Kochan, Thomas A., Robert B. McKersie, and Harry C. Katz. "U.S. Industrial Relations in Transition: A Summary Report." Paper presented at the Annual Meeting of the Industrial Relations Research Association in Dallas, Texas, March 28-30, 1984.

Lawler, Edward E., and Susan A. Mohrman. "Quality Circles: After the Fad." *Harvard Business Review* 63 (January-February 1985): 65-71.

Little, Judith Warren. "Norms of Collegiality and Experimentation: Workplace Conditions of School Success." *American Education Research Journal* 19 (Fall 1982): 325-40.

McPike, Liz. "Shared Decision Making at the School Site: Moving Toward a Professional Model." *American Educator* 11 (Spring 1987): 10-46.

Margolies, George H. "The Relevance of Yeshiva to Public Education: A Management Perspective." *Journal of Law and Education* 16 (Winter 1987): 105-111.

National Education Association, Instruction and Professional Development Division. "Discovery Guide." Forthcoming.

National Education Association, Research Division. *Studies of Teacher Morale*. Research Memo 1964-7. Washington, D.C., 1964.

National Education Association and the National Association of Secondary School Principals. *Ventures in Good Schooling*. Washington, D.C., 1986.

Needham, Nancy. "Who's in Charge Here?" *NEA Today*, April 1987, pp. 10-11.

"The New Industrial Relations." *Business Week*, May 11, 1981.

New York Stock Exchange, Office of Economic Research. *People and Productivity: A Challenge to Corporate America*. New York: New York Stock Exchange, 1982.

Parker, Mike. *Inside the Circle: A Union Guide to QWL*. Boston: South End Press, 1985.

Perrow, Charles. *Complex Organizations*. New York: Random House, 1979.

Rabban, David M. "Professionals and the World of Work." *Newsletter of the National Center for the Study of Collective Bargaining in Higher Education and the Professions* 15 (March/April 1987): 5-8.

Reisman, Barbara, and Lance Compa. "The Case for Adversarial Unions." *Harvard Business Review* 63 (May-June 1985): 22-32.

Rosenholtz, Susan J. "Effective Schools: Interpreting the Evidence." *American Journal of Education* 93 (May 1985): 352-88.

Schmidman, John, and Kimberlee Keller. "Employee Participation Plans as Section 8(a)(2) Violations." *Labor Law Journal* 35 (December 1984): 772-80.

Showalter, Jon, and David Yetman. "Pima County: The Dilemma of Weak Unions and QWL." In *Improving Government: Experiments with Quality of Working Life Systems*, edited by Neal Q. Herrick, pp. 118-29. New York: Praeger, 1983.

Smith, Richard J., and Herbert J. Klausmeier. *The Development of a Facilitative Environment for Learning and Research Through R & I Units in the Secondary School*, 1966-67. Working Paper No. 8. Madison: Wisconsin Research and Development Center for Cognitive Learning, 1967.

Sockell, Donna. "The Legality of Employee Participation Programs in Unionized Firms." *Industrial and Labor Relations Review* 37 (July 1984): 54-56.

United Rubber, Cork, Linoleum, and Plastic Workers of America (UFW). "Quality of Work Life Programs." *Labor Management Cooperation*, pp. 49-55. Washington, D.C.: U.S. Department of Labor, 1984.

U.S. Department of Health, Education, and Welfare. *Work in America: Report of a Special Task Force to the Secretary of Health, Education, and Welfare*. Cambridge: MIT Press, 1973.

U.S. Department of Labor, Bureau of Labor-Management Relations and Cooperative Relations. *A Conference on Quality of Work Life: Issues Affecting the State-of-the-Art*. Washington, D.C.: U.S. Department of Labor, 1984.

_____. *Quality of Work Life: AT&T and CWA Examine Process after Three Years*. Washington, D.C.: U.S. Department of Labor, 1985.

_____. *A Resource Guide to Labor-Management Cooperation*. Washington, D.C.: U.S. Department of Labor, 1983.

_____. *U.S. Labor Law and the Future of Labor-Management Cooperation*. Washington, D.C.: U.S. Department of Labor, 1986.

Verma, Anil. "Employee Involvement Programs: Do They Alter Worker Affinity Toward Unions?" *IRRA 39th Annual Proceedings*, pp. 306-12.

Walton, Richard E. *From Control to Commitment in the Workplace*. Labor-Management Brief No. 6. Washington, D.C.: U.S. Department of Labor, 1985.

Watts, Glen E. "QWL and the Union: An Opportunity or a Threat?" *Labor-Management Cooperation*, pp. 11-15. Washington, D.C.: U.S. Department of Labor, 1984.

Wynne, Edward A. "Looking at Good Schools." *Phi Delta Kappan* 62 (January 1981): 377-81.

The "national programs" side of the Eisenhower program, which is administered by the Fund for the Improvement and Reform of Schools and Teaching (FIRST) office, supports projects of national significance, mostly collaborative projects among school districts, universities, science museums, and the business community. One grantee is implementing an innovative secondary-school science program that was designed with a grant from NSF. Another is identifying films useful for teaching physics and is editing those films into short vignettes which, augmented with interactive software, will be distributed nationally.

I would like to leave with the Committee a general summary of the program and descriptions of the 69 projects currently being supported by the Eisenhower national programs. Also, I want to mention that FIRST administers the Fund for Innovation in Education (FIE). FIE supports a number of projects using technology to strengthen teaching and learning in mathematics and science. FIE also helps support the NSF-administered Square One, an educational television series aimed to motivate 8-to-12-year-olds to learn and use mathematics.

Mr. Chairman, I was pleased to find when I arrived at OERI two weeks ago much collaboration underway throughout OERI and the Department. For instance, FIRST is already working closely with OESE, with other offices in the Department, and with other Federal agencies. FIRST and OESE continually seek input and advice from NSF, the Department of Energy, the National Aeronautics and Space Administration (NASA), and other Federal agencies. At the Annual National Conference of Title II State Coordinators each year, NSF staff set up an exhibit, distribute information, and are responsible for about a half-day of the conference program. Similarly, FIRST and OESE staff participate in NSF conferences and help review applications for NSF grants.

Tomorrow marks the beginning of FIRST and OESE's first-ever joint national conference. Science-education leaders from all 50 states, including directors and leadership teams for the 29 FIRST discretionary mathematics and science programs, will be here, as will representatives from throughout the Department and its programs--staff from the National Diffusion Network (NDN),



NATIONAL EDUCATION ASSOCIATION
1201 Sixteenth Street, N.W.
Washington, D.C. 20036

END

U.S. DEPT. OF EDUCATION

OFFICE OF EDUCATIONAL
RESEARCH AND
IMPROVEMENT (OERI)

ERIC

DATE FILMED

OCT-12-1990

so. Let me mention another agency that we hope to collaborate more with. Earlier this month, the Education Department assisted the Energy Department in developing a national conference on science education. Secretary Watkins promised an "action plan" to improve science and mathematics education, and as Secretary of Energy, he commands considerable array of resources--a network of 50 laboratories and some 135,000 scientists. Think what could happen if those labs were opened to students and teachers, if those scientists were to create and offer intensive workshops for teachers. Upgrading teachers' knowledge of science and mathematics is central to improving student learning in these subjects. We hope to work with the Energy Department in this effort.

Mr. Chairman, the Department also assists postsecondary students and institutions of higher education. Our Minority Science Improvement Program, for instance, offers institutional grants, cooperative grants, and other kinds of grants to bolster mathematics programs in minority institutions. Another program, Graduate Assistance in Areas of National Need, provides fellowships to financially needy graduate students of superior ability studying in areas of national need--areas that include science, mathematics, and others designated by the Secretary of Education in consultation with NSF, the National Academy of Sciences, the National Endowments for the Arts and Humanities, and other federal and nonprofit agencies and organizations.

The Fund for the Improvement of Postsecondary Education (FIPSE) in 1988 supported nearly 50 projects related to science, mathematics, and engineering. One project helped about 15 colleges and universities adapt a retention program that has promoted high levels of achievement in mathematics and high rates of persistence among minority undergraduates. Another FIPSE-supported project prepares mid-life science and technical professionals for new careers in secondary school science and mathematics teaching through a one-year teaching internship. FIPSE and FIRST support also several community college projects designed to prepare at-risk secondary students for entry into technical programs in local technical and community colleges.

Mr. Chairman, let me now turn to the third category, research. At least 10 of the Depart-

ment's 21 national research centers are involved with one aspect or another of mathematics or science education. Projects underway at the research centers include identifying the intuitive mathematical knowledge that youngsters bring to the classroom, pairing students and giving them memory tools to increase their performance in solving arithmetic story problems, identifying inadequacies in teacher knowledge, analyzing biology textbooks, investigating strategies for measuring higher-order thinking in mathematics, devising techniques for examining the "instructional sensitivity" of math test questions, developing procedures for assessing classroom coverage of mathematics content and for assessing the impact of tests on secondary mathematics classrooms, examining the writing students do in science classes, studying the operation and role of mathematics and science departments in secondary schools, analyzing the impact of policies on what is taught and learned in science and mathematics, and other efforts.

Activities at two centers in particular bear mentioning. The Center for the Learning and Teaching of Mathematics (at Madison, Wisconsin) is working to identify fundamental knowledge that should be taught to all students, to organize and sequence that knowledge, to bridge mathematics to other subjects, and to narrow gaps between the prescribed curriculum (that is, what students are supposed to learn) and the achieved curriculum (what students actually learn). The National Center for Improving Science Education (at Andover, Massachusetts) is examining what tests currently measure and what they ought to measure, the content of science curricula and instruction, and the knowledge and skills of teachers--how teacher preparation, staff development opportunities, and school and school district structures support (or do not support) the teaching of science.

Mr. Chairman, NSF was involved in the design and ongoing work of those two research centers. Its guidance, along with advice from other science and mathematics agencies and organizations, have been and will continue to be sought and incorporated into the upcoming competition of new research centers. For that competition, we have proposed 12 research centers, including a center for the study of teaching and learning in mathematics, a center for the study of teaching and learning in science, and other centers that will do important research in science and mathematics

education.

I would like to mention one other research center that we have supported, the University of Pittsburgh's Learning Research and Development Center. While mathematics is not the only discipline the Pittsburgh center investigates, this month it was awarded a \$10 million Ford Foundation grant to implement "Quantitative Understanding: Amplifying Student Achievement and Reasoning," or QUASAR, a project aimed to improve mathematics instruction and learning in middle schools that serve economically disadvantaged students.

The Department's research centers are administered by OERI's Office of Research, which is directed by Dr. Milton Goldberg. Dr. Goldberg has been actively working with NSF and other Federal agencies, and he is the Department's liaison with Dr. Shakashiri's office at NSF. In March, Dr. Goldberg addressed representatives of 32 Federal agencies at a conference sponsored by the Federal Interagency Committee on Education (FICE) and the Mathematical Sciences Education Board. His remarks are summarized in a report on the proceedings of that conference, which was published last week and which I would like to leave with the Committee.

As for higher education research related to mathematics and science education, the Office of Research has sponsored a number of projects. One project resulted in models that faculty can use to examine what college graduates who major in biology, chemistry, computer science, mechanical engineering, or physics actually know in that field. Some 3,000 copies of the report on this project, Signs and Traces, have been distributed to college science faculty and others.

A result of another project, a 1988 study of mathematics course-taking in college, NSF contributed to a detailed analysis of college student course-taking in more than 200 specific college courses in science, engineering, mathematics, computer science, and engineering technologies. The joint Office of Research-NSF study led to another project that found graduates of business administration programs to be, judging by their college coursework, unprepared to deal with the technol-

ogy, quality control, and international demands of the business world today.

Findings from the research centers, regional labs, in-house research, and external research, as well as statistical information, are available to the Committee and anyone else through the Education Resources Information Center (ERIC) database. Like the other 14 ERIC clearinghouses, the Clearinghouses on Information Resources (or education technology and information sciences; at Syracuse, New York) and on Science, Mathematics and Environmental Education (at Ohio State University) work with national associations and government agencies, make presentations, and produce bulletins, digests, summaries, and syntheses of research. The Clearinghouse on Science, Mathematics and Environmental Education estimates that it responds to an average of 2,500 requests for information per month. Last week, that Clearinghouse brought together representatives from NSF, the Mathematical Sciences Education Board, and more than 15 other organizations to discuss ways to increase communication and the flow of information among them and their organizations.

Mr. Chairman, those are some of the efforts in assessment and statistics, direct assistance, and research through which the Department is working to improve mathematics and science teaching and learning.

I would like to conclude my remarks today by pointing out briefly how some of the initiatives President Bush proposed last year in The Educational Excellence Act of 1989 would also help. The National Science Scholars program would provide not only grants but national recognition for 500 undergraduates excelling in mathematics and science. Mr. Chairman, students who excel in these two demanding disciplines deserve such rewards. And by bestowing upon them and their achievements prestige and national visibility, the Science Scholars program could encourage more American students to work harder and invest greater effort in these two subjects, which are vital to our national interest. A lack of student effort is one reason we are doing poorly as a Nation in these subjects.

Another of the President's proposals, the Merit Schools program, would strengthen the mathematics achievement of disadvantaged youngsters. As the Committee knows, one of the criteria for judging schools would be test scores, including mathematics scores. I believe the Merit Schools program could go a long way toward improving learning in mathematics and other subjects for disadvantaged students--the youngsters who stand the most to benefit from it.

The President proposed two programs aimed to encourage and support good teaching. I mentioned earlier the Alternative Teacher and Principal Certification proposal, which could give states and schools more freedom and flexibility in addressing their teaching force needs. The other proposal, Presidential Awards for Excellent Teachers, would provide national recognition and rewards for outstanding teaching. The proposal is based on a deep belief I share with the President: if we want to more excellent teaching, we must recognize and reward it.

Mr. Chairman, the Department is committed to improving mathematics and science teaching and learning for all students. That commitment is shared by NSF, the Department of Energy, and in a number of other agencies and organizations inside and outside the Federal government, as indicated in the programs I have mentioned today. Obviously, we are working closely together. That is not to say we can't work more closely and more productively together. Collaboration and teamwork within and outside the Department to increase the impact of education information--information from assessment and statistics, practice, and research--is my top priority for OERI.

I speak on behalf of the Department in saying that we will be looking for opportunities to tighten and strengthen inter-agency collaboration. We will be looking as well for new and unexplored avenues that could lead to increases in student learning in mathematics, science, and other important subjects. And we look forward to working with you and other distinguished members of the Committee to bring about these desperately needed improvements.

Thank you.

The First National Conference on the Dwight D. Eisenhower Mathematics and Science Education Improvement Program:

“Building Partnerships for Excellence in Mathematics and Science Education in the 1990s”; November 1-3, 1989

Christopher T. Cross

It's a pleasure to be here.

I think we're all aware of the growing concern about mathematics and science education in this country. Americans are worried about the fact that, when compared with students in other countries, our youngsters consistently come in last or near last on mathematics and science tests. The public is right to upset when only about half of our high school juniors can do junior high mathematics or know enough about science “for informed participation in the nation's civic affairs” (NAEP).

Our leaders are also concerned. As you know, a little over a month ago President Bush and the governors agreed on the need for national education performance goals in seven general areas. The second “goal area” listed in their communique (or compact) is, and I quote, “the performance of students on international achievement tests, especially in math and science.”

Various Congressional committees and subcommittees have been holding hearings to find out what is being done--and what needs to be done--to address those goal areas and to improve student learning in mathematics and science.

Two days ago, I testified before the House Committee on Science, Space, and Technology. I

told them about this conference, about the Eisenhower state and national programs, about FIRST and the Office of Elementary and Secondary Education, about our collective (and a few of our specific) efforts to improve teaching and learning in science and mathematics.

One thing I told them about--and that I want everyone here to know about--is two important upcoming assessments of student performance in science and mathematics.

First, as many of you know, the 1990 National Assessment of Educational Progress will provide student achievement data that will permit us to make, for the first time, comparisons of student performance across states in one subject and for one grade level: 8th grade mathematics. The assessment will be administered in about four months (late winter/early spring). Results should be available in 1992.

Also in 1992 the results of another major assessment will be reported--an international assessment examining the mathematics and science achievement (as well as geography achievement) of 9-year-olds and 13-year-olds in 20 countries, including for the first time China and the Soviet Union. (This assessment will be conducted in the spring of 1991.)

Together, these assessments will provide a national and an international "profile" of student performance in mathematics and science. They will provide a baseline against which to measure the impact of our collective efforts.

But there is no need--nor can we afford--to wait for the results in 1992. Americans recognize the need for better teaching and learning of mathematics and science now--not just because we need more scientists and engineers; but because we need workers who possess mathematical and scientific competencies that can be built upon in the workplace; because we need citizens who have knowledge that illuminates vital and unavoidable public policy decisions (acid rain, global warming, ozone, Third World debt).

Mathematics and science can enable youngsters to see the world more clearly and to ask better questions about the way things work--in the classroom, at home, on the job, or in the voting booth. That is why these two "decision-making tools" must be developed in the hands and minds of all our children.

We all know that schools are not alone to blame for the shortcomings in American science and mathematics education. Societal values, television images of the "mad scientist," parents who believe that innate ability is more important than homework and intellectual effort--these attitudes are part of the problem.

But we also know that many elementary teachers are uncomfortable with mathematics and especially science. We all know that many secondary-school principals have a tough time finding people qualified to teach chemistry, physics, and computer science.

We all know that better teaching and better instruction are critical to better learning in these two subjects. Because unlike reading or writing or the arts, youngsters generally do not "pick up" science and mathematics on their own; they generally don't read about nuclear physics in their spare time. Science and mathematics require a high level of discipline, persistence--and a teacher in command of the subject and who knows how to develop youngsters' knowledge and competencies.

That's why this first meeting of America's top leaders for improving mathematics and science teaching and instruction is so important.

The Eisenhower "state grants" program, Eisenhower national programs, the Fund for the Improvement of Schools and Teaching, the National Diffusion Network, the national research centers on science and mathematics, the regional labs, ERIC clearinghouses--these are some of the members of the Department of Education's "team" for improving science and mathematics teach-

ing and learning.

I am delighted that each of those "team members" is present here today. I am delighted also that people from the 50 state education and higher education agencies, from over 50 state and local FIRST programs, from national associations of science and mathematics teachers, from the National Science Foundation, the Department of Energy, NASA, and the Office of Management and Budget are here.

One of my top priorities as Assistant Secretary for Educational Research and Improvement is to make information and "lessons learned" from research, statistics, and practice make a difference in education performance.

Doing that requires a team effort--pooling our knowledge, passing our "lessons learned" along to the people who must use those lessons if our efforts are to have an impact on teacher effectiveness and student learning.

This conference exemplifies that kind of team effort. I want to thank our people in FIRST and people in the Office of Elementary and Secondary Education (across The Mall) for bringing you all here together. The collective wisdom of the people in this room could substantially and nonincrementally increase the level of science and mathematics knowledge among students across the United States--if that wisdom gets used to guide reform efforts--if it gets into the hands of the people who are on the front lines of those efforts--teachers, parents, principals, policymakers, and students.

How can we do that better? That is one question for which I hope there are answers at the end of this conference.

That is the question I believe we must answer in order to produce the large-scale improvements in science and mathematics learning for all students. For our success will be measured not by

the number of projects we fund or the number of teachers our programs reach, but by the difference our efforts make in terms of student learning.

Our next speaker today is a man who has made a difference in student learning. His Laboratory at Yale, during the last two decades, has graduated more Ph.D.s in experimental nuclear physics than any other institution in the world.

He is on leave from his former position as Henry Ford II Professor of Physics at Yale University, where he founded and directed the A.S. Wright Nuclear Structure. One of the world's leading nuclear physicists, our next speaker has done pioneering studies on the structure and dynamics of nuclei and is considered the "father of modern heavy ion science." He has also played a part in the development of accelerators, of detection systems, and in computer-based acquisition and analysis systems.

For over 20 years, Dr. Bromley has been a leader in the national and international science and science-policy communities. He chaired the National Academy's Physics Survey in the early 1970s. As president of the largest scientific society in the world, the American Association for the Advancement of Science, and as president of the world-coordinating body for the International Union of Pure and Applied Physics, he has served as one of the leading spokespersons for U.S. science and for international scientific cooperation.

I could go on, but I think we would all prefer to hear his own words than words about him.

It is my honor and privilege today to introduce one of the most influential scientists in the United States, the Assistant to the President for Science and Technology...and Director of the Office

of Science and Technology Policy in the Executive Office of the President, Dr. Allan Bromley.

Bruns
is promised
K

Remarks of

Christopher T. Cross
Assistant Secretary
For Educational Research and Improvement
United States Department of Education

LEAD Directors-National LEADership Network Annual Meeting

Washington, D.C.

November 13, 1989

I'm delighted to be here and have this opportunity to talk with the people providing much--if not most--of the in-service training for America's principals and superintendents.

The need to develop strong leadership in schools is greater than ever before.

I think we are all aware that there are enormous changes in the offing for American education. As you know, two months ago President Bush and the 50 governors met to discuss national performance goals in education.

The summit set a tone for the Nation, and it set an example for states and communities. Think of the impact it would have on schools if every state were to call together its top leaders to launch a process for establishing its own performance goals. Imagine if every local community did the same. All of us here know what a difference it makes when schools have clear goals.

One message that was implicit in the education summit is that, whatever performance goals are agreed to, schools must not be expected to reach those goals by themselves. Schools must have help. Local businesses, local colleges and universities, community colleges, local government, and other organizations must get into the act. Resources throughout the community must be tapped and mobilized to move schools and students toward those goals.

Tapping and coordinating new resources depends on leadership--usually, from a strong principal or a strong superintendent--ideally, from both. That has obvious implications for these 57 LEAD projects and for the National LEADership Network.

But the need to develop bold leadership in American schools involves more than identifying new resources or setting performance goals, though both of these are

important. Bold leadership is needed because the structure of American education is changing. Leaders are needed to steer and guide those changes.

In the past year or so, for instance, we have seen three state legislatures give parents and students their choice of which school to attend; some 20 other states are talking about similar proposals. A number of states and districts are beginning to emphasize higher-order thinking; several states are pioneering assessments that will enable them to measure students' reasoning and higher-order intellectual tasks. States are moving toward accountability systems that link incentives to performance at the school-building level. Today, most states have drafted regulations to allow more budgeting and staffing decisions by individual schools.

"Restructuring" has become a rallying cry for many who talk about education reform these days. A group of educators and policymakers that OERI convened last month agreed on a general definition for that term, restructuring. They agreed, and I'm paraphrasing slightly, that restructuring refers to activities that enable the education system and educators to use resources in nontraditional ways for the purpose of improving student performance. They agreed that those activities must include, as a critical component, assessments that document the success or failure of those new uses of resources.

That definition portends wide latitude for experimentation by the people in our schools. One form of restructuring, school-based management, for instance, often requires that teachers and parents take on new roles and new responsibilities. But perhaps the most dramatic and cataclysmic changes are required of the school leaders--superintendents and principals.

I think most of us here agree that school-based management and other forms of restructuring are needed.

But what happens when a traditional-thinking school leader, who has been doing things the same way for 10 or 15 years, is suddenly given new freedom and wide latitude to use resources in whatever way he or she can imagine?

We all know that today's principals and superintendents were not trained for the tasks that restructuring and decentralization are soon going to demand of them.

The situation reminds me of a Matthew Arnold poem in which his visit to a Medieval monastery causes him to see himself--and by implication, Victorian England--"[w]andering between two worlds, one dead, the other powerless to be born" ("Stanzas from the Grand Chartreuse").

American education today faces a similar crossroads or "paradigm shift." The old assembly-line model of education may not be dead, but the prognosis is not good. And the new education decentralization and restructuring is, in reality, powerless to be born--unless schools are supplied with enlightened leadership.

It is largely up to principals and superintendents lead schools into the new world of restructured schools. But the administrators in our schools today were hardly trained for the tasks restructuring and decentralization demand.

That is where this group comes in. LEAD and the National LEADership Network are among the few institutions devoted to improving the performance of leaders currently in our schools. Never has that task been so important.

I understand that the LEAD centers are laboring under a mandate to "institutionalize." Let me suggest that there is really only one way to succeed. Do what you were created to do. And do it well. The need is there. Your task, as I see it, is to figure out how to tap that need--how to transform the need for leadership training into a demand for such training. Then supply that training, and supply it well.

That is your challenge. I want to encourage you to draw on OERI to help you meet that challenge.

My overriding goal, as Assistant Secretary for Educational Research and Improvement, is to see that education research makes a difference in education practice. As you know, we support nine regional laboratories, 21 national research centers (2 on educational leadership), 16 ERIC clearinghouses, the National Diffusion Network, and other projects. My mission is to encourage and enable these various components to function as a system, as a team, working together to improve student learning.

Of course, OERI's stock in trade is information--information from research, practice, and statistics. OERI's mission is to supply such information to people on the front lines of education--teachers, parents, administrators, and others who must use that information if it is to make a difference in student learning.

Obviously, there is a natural opportunity for collaboration between you here today and many of OERI's other team members. I realize you are already taking advantage of it in some ways. The regional labs are working closely with the LEAD centers in their regions. Another example is the recent collaboration between LEAD and the National Center for School Leadership at the University of Illinois.

I want to encourage more of that. If research is to have

an impact on practice, practice must also have an impact on research; the needs of practitioners must inform the work of researchers.

Let me conclude by just reiterating that your efforts are crucial to the structural changes in store for American education. Few groups are out there who can help school leaders structure changes in their schools so as to measurably and significantly improve school performance and student learning. That, after all, is where it all has to add up. Our efforts must be measured by the improvements they make in student learning.

I hope you will keep that in mind as you work to develop school leadership. And I hope you will look to various members of the OERI team for information and assistance.

I look forward to working with you. Thank you.

**The Second National Forum on Substance Abuse Issues in Higher Education; November 15-17,
1989**

Christopher T. Cross

It is an honor to be here and participate in this second National Forum on Substance Abuse Issues in Higher Education. I want to thank you all for giving your time and effort to help make American college campuses drug free.

We in the Office of Educational Research and Improvement (also known as OERI) are combatting drug abuse on three fronts, which I want to just mention. First, OERI is supporting the development of a variety of early childhood drug prevention materials, methods, models, and curricula. Second, OERI has so far turned the national spotlight on 77 elementary and secondary schools that have exemplary drug-prevention and intervention programs, through our Drug-Free School Recognition Program. And third, we support this Network of Colleges and Universities Committed to the Elimination of Drug and Alcohol Abuse.

This Network exemplifies how national concerns ought to be addressed. For if we are to advance in the face of this problem as a Nation...if we are going to win the war on drugs...we must do it through coordinated, collaborative, and comprehensive efforts. We must put our heads together and pool our knowledge about programs and policies that work to

deter drug and alcohol abuse.

Drugs are a visible sign of an invisible but very real hurdle to learning. Impulsiveness. The pursuit of immediate gratification.

Learning requires persistence, effort, mental sweat. But it pays off. Reading and studying and

thinking lead to intellectual growth.

Drugs don't. Drugs stunt or slow mental growth. They waste a person's time. And as we all know, they can waste a person's life.

I applaud your efforts to prevent that from happening on your campuses. Only where minds are clear, uncluttered, and free of chemical interference can learning and teaching and "the life of the mind" thrive. That is what college is all about.

That is what your work makes possible.

I want to introduce today a United States Senator from the Hoosier State who, after taking office this January, made the war on drugs his priority.

The Senator from Indiana believes that the family is the "basic building block" of our society. He believes that no society can thrive and prosper with a self-destructive force chipping away at its foundation, the family.

While in the U.S. House of Representatives, he served on the Select Committee on Children, Youth and Families.

Soon after arriving in the Senate, he introduced his American Family Act, which includes 26 pieces of legislation designed to strengthen education, improve child care, and help disadvantaged children.

Today, he serves on the Senate Armed Services Committee; and he is the ranking Republican (or ranking "minority member") of the Senate Labor and Human Resources Subcommittee on

Children, Family, Drugs and Alcohol.

Please join me in welcoming the junior Senator from Indiana, Senator Dan Coats.

November 16, 1989

**Christopher T. Cross
Assistant Secretary of Educational Research and
Improvement**

**The Mission of the Special Study Panel on Education Indicators as
Viewed by the Office of Educational Research and Improvement**

**Ted Sanders has presented for you the Administration's
view of the timeliness and importance of your work. I
want to help begin your task by focusing on some of the
substantive issues which I believe this panel will want to
consider early on.**

**Perhaps the first issue, one you may address even today, is
what analytical model or framework should organize a**

system of education indicators. Basically I think there are three possibilities:

The first model is one based on the scientific approach.

This approach begins from a synthesis of the available research, and then reports on the important inputs which research links to learning, or to high school completion, or to other positive results of education.

One example of researchers' contribution to the development of indicators is their experience with modeling socioeconomic differences among students.

Researchers remind us that we can not gauge the effectiveness or the quality of schools without estimates of differences in student populations.

The scientific approach to indicator development

summarizes key statistics related to educational inputs, selected demographic variables, and educational outputs of different kinds. This is currently the framework for the Condition of Education (the indicator report of NCES) and the annual indicator reports of the Council of Chief State School Officers as well as other indicator publications.

A second model for organizing educational indicators is one based on professional educators' or practitioners' views of the principal domains of the educational process. This approach reflects shared perceptions and contemporary thinking -- rather than research findings -- about what's important. An example of this type of indicator is teacher quality. The research on teacher quality (what qualities matter and estimates of

their impact) is inconclusive; nevertheless educators want information on changes in teachers' credentials or shifts in career patterns.

The categories of interest to educators include resources and commitment, school context and organization, indicators of curriculum and instruction, and measures of outcomes in achievement and school completion. The RAND sourcebook on indicators for monitoring mathematics and science education -- included in your packet of materials -- is an excellent example and resource for this approach to modeling the field of education indicators.

A third model might be termed an "atheoretical approach."

It implies that there is an institutional structure

already in place and that some pieces of information are pragmatically important -- if schools are to work efficiently. The purpose of this approach is not to verify the model itself, but to uncover the "pressure points" where policymakers need accurate and timely information.

For example, education decision-makers are vitally interested in statistics on teacher/pupil ratio for reasons that sometimes have little to do with their actual impact on classroom effectiveness.

Each of these analytic models has its advantages and its disadvantages. Surely the "best" approach to developing a set of indicators is not one approach but some combination of these three. In other words, all indicator development

must first be informed by science, but it is important too to report on what policymakers want to know and educators feel are issues of the day. Your task is to figure out the proper balance among these three approaches. The need for striking this kind of balance I think is well illustrated by the history of the social indicators movement which you'll be discussing later this afternoon.

Another way to approach your task is to ask who your audience is. Are the indicator reports of the Department of Education read by the Press, by the public, by parents, by teachers, by principals, by state education policymakers, by the business community? Audience is an important consideration when deciding not only what to report, but how to report education indicators. Economic indicators have become so frequently and ubiquitously reported that

everyone has learned what they represent. But that wasn't always the case and there are lessons we can learn too from the successful development of economic indicators, also the topic of one of the papers on today's agenda.

Levels of aggregation are another an important dimension. Policymaking is increasingly focused on the state-level, though recent reform efforts stress a need for site-level management as a part of the accountability movement already underway in several states. In a decentralized system of education, it is essential that the interests of schools, school districts, states, and federal government are joined to construct information and indicator systems that service all levels of the educational system.

In general, indicator development is a combination of two

processes: First it is a technical process that tackles issues of educational measurement, data collection, and reporting. Second, it involves consensus-building around which indicators really matter. In the absence of clear and agreed-upon educational goals, the consensus-building can be the more difficult half of the task.

But as Ted has pointed out, the resolutions of the Jeffersonian Compact have already started some of that work. The President and the nation's Governors are now committed to announce early in 1990 a set of national educational goals. Over the next few months, the National Governors Association is likely to sponsor several hearings to learn what parents and educators and community leaders hold as their educational goals. I also want to draw your attention to the final section of the President

and the Governors' communique which reads: "When goals are set and strategies for achieving them are adopted, we must establish clear measures of performance and then issue annual Report Cards on the progress of students, schools, the states, and the Federal Government."

I believe the Jeffersonian Compact has two implications for your task: First, you should note that the seven goal areas mentioned in the communique were introduced as examples rather than as an exhaustive list. I hope you will consider either refining or adding to their goal areas. For example, issues related to postsecondary education were not included among their seven areas. Second, by lending your technical guidance to general problems with measuring and reporting educational progress, you may be better positioned than any other group to intelligently

inform the initial efforts to issue "annual Report Cards on the progress students, schools, the states, and the Federal Government."

Last, I leave you with an observation made at a recent Congressional hearing by Gordon Ambach, Executive Director of the Council of Chief State School Officers. The Wall Chart, Ambach pointed out, "was not created as a report card on national goals or objectives but rather as a display card of the only three 'outcomes' the Department could find available on a state-by-state basis... No one is satisfied that those [indicators] are a satisfactory measure of results of American education. They are used year after year solely because they are the only measures available."

We hope you'll guide us toward a better system, a system that will help states and districts as well as the Department of Education provide information that parents, principals, and policymakers need and can use.

Alternate Certification Meeting
December 5, 1989
Christopher T. Cross

Welcome. We are delighted to have you here.

I was asked to keep my opening remarks brief, and when I realized why, when I saw the line-up of speakers. We will be hearing today from an array of experts who have created and run--or studied and evaluated--various alternate certification programs.

Before introducing the first such individual, who is largely responsible for launching the first statewide alternate certification program in the Nation, let me just say a few words about why we are sponsoring this meeting today.

In simplest terms, President Bush, Secretary Cavazos, Under Secretary Sanders, myself, and many others believe that alternate certification could help plug several glaring gaps in the Nation's teacher-and-principal supply. While it is a relatively new policy, where it has been tried, the results have been encouraging.

First, it has proven effective as a means of recruiting minorities into teaching. While fewer blacks and Hispanics are entering colleges of education in this country, alternate certification has demonstrated the ability to attract a disproportionately high percentage of minority individuals into teaching. In New Jersey, for instance, 21 percent of alternate route candidates are minorities; that is double the percentage of minorities in the State's teaching force.

Second, alternate certification programs can attract teachers in critical-shortage subjects. While there is general disagreement today about whether the Nation will face a teacher shortage tomorrow, few dispute the documented fact that schools are having a hard time finding enough qualified individuals to teach mathematics and science (and certain other subjects). Two out of three secondary school principals say they have a tough time hiring individuals qualified to teach chemistry or physics (or computer science). In one year, for every new mathematics or science teacher who entered the classroom, 12 left.

There is no relief in sight. A recent Rand Corporation report predicts that American colleges of education will produce fewer than half of the science and mathematics teachers American schools will need in the foreseeable future.

Many of you know what happens when a qualified person cannot be found to teach physics or geometry. The principal has no choice

but to hire someone having little if any college coursework in the subject. This practice, known as "emergency certification," is not only permitted but is fairly common in many States, particularly for recruiting science and math teachers. The problem, of course, is that such "teachers" may know little more than students about the subject. (Perhaps "emergency certification" is one reason our students consistently come in last or near last on international tests in these two subjects.)

Alternate certification helped New Jersey eliminate "emergency certification." It could enable other States to do so as well.

Third, alternate certification gives schools and communities more choices, greater flexibility in building their most important resource. Teachers and principals.

As you know, States and school districts are beginning to shift more of the decisions about education out of central headquarters and into the schools themselves. "School-based decision-making" appears to be one of the fastest growing school restructuring efforts in the Nation.

But I ask you. What education decision is more important to any school or community than who will teach its children or lead its teachers? (Nothing in any classroom--no textbook, no instructional program, nor any other resource--influences student learning so much as classroom teachers. And no single individual in any school has the capacity to improve schoolwide performance than the principal.)

Schools and communities ought to have every option imaginable to attract the best possible candidates to teach and provide educational leadership.

Alternate certification provides that option. Alternate certification can supplement, not supplant, the traditional pipeline of educators.

Surveys indicate that education leaders would like to have this option. Eight out of 10 school principals and superintendents support the notion of alternate certification.

On the other side, surveys also suggest that a sizable pool of interested candidates may be available in many communities. A National Executive Service Corps survey found that 8 out of 10 of the military personnel responding indicated an interest in teaching as a new career. It found 7 out of 10 corporate scientists and engineers also potentially interested in teaching.

In summary, this is what we know. We know that America's schools need more of certain kinds of teachers. Minorities. Mathematics and science instructors. (And more outstanding

teachers in all disciplines.)

We are pretty sure that there is a significant pool of potentially interested candidates out there--in the military, in business and industry, in research labs, government offices, in college classrooms and private schools.

We know that many school leaders may be interested in such candidates.

The Bush Administration believes that alternate certification is an idea whose time has come. That is why President Bush proposed in April, as part of his Educational Excellence Act of 1989, the Alternative Teacher and Principal Certification program--a program that would help States open the doors of their schools and classrooms to talented individuals who lack an education degree but who may nevertheless be qualified to teach and provide leadership in public schools.

It is time to extend educational leadership and teaching opportunities to more Americans. It is time to provide schools with more real options regarding one of their most important decisions.

And it is time to find out more about alternate certification from people who have implemented it, operated it, and lived with it.

We came here today not just to "hail the promise" of alternate certification, but to hear about the obstacles and discover the pitfalls to successful implementation of such programs. OERI sponsored this meeting to help us identify the critical research questions that must be answered if alternate certification is to fulfill its promise as a policy tool for strengthening teaching and learning in schools and classrooms across America.

I am delighted that we have a line-up of people here today who can help identify such research questions.

And I am honored to introduce you to one of those individuals...one of the Nation's "leading lights" in education and (next to Governor Kean) the highest ranking educator in New Jersey.

The Garden State is "growing" some of the most innovative approaches to education policy anywhere. Its alternate teacher certification program (or what they call the "provisional teacher program") is a success story familiar to many of you.

We would do well to bear in mind, however, that alternate certification, important as it is, is only one piece of a comprehensive strategy to improve teaching quality in New Jersey.

Another important effort, for instance, is the Academy for the Advancement of Teaching and Management...which brings teams of teachers--with their principals--together to examine research and offer practical suggestions on how to use new theories to improve teaching and learning.

In the latest development, last week the commissioner announced that two key components of the alternate certification program are being extended to all first-year teachers. All first-year teachers will be hired on a "provisional" basis and will receive lots of assistance from a mentor and a district-level support team.

It is my honor and pleasure to introduce the man who announced this extension of a "lesson learned" from alternate certification to all new teachers...the person behind this and a host of other innovative reforms in one of the Nation's leading education-reform states: Commissioner of Education for the State of New Jersey, Dr. Saul Cooperman.

Since 1982, when he was named as commissioner, Dr. Cooperman has initiated a comprehensive program to raise education standards in New Jersey. He has implemented programs to revitalize teaching as a profession, to raise expectations for student performance, and to make educational leadership more effective. I should mention also that two years ago, Dr. Cooperman was elected to the governing board of the national Assessment of Educational Progress (what those of us in OERI refer to as "NAEP").

Please help me welcome the education commissioner of New Jersey, Dr. Saul Cooperman.

**The First National Conference on Comprehensive School
Health Education (FIE, in FIRST)**

December 11, 1989

Christopher T. Cross

I am delighted to be here.

I want to take this opportunity to thank the FIRST staff (Richard, Allen, and others) for sponsoring this national conference on comprehensive school health education. I want to commend the FIRST office for overseeing this first major competition for comprehensive school health education programs--the first such competition not only in OERI but the first, I'm told, in the Department. (We're seeing a lot of "firsts" today.)

And I want to congratulate you. The competition was stiff; you were selected from among 80 proposals; the evaluation process was rigorous.

I want to talk briefly today about why this program is such an important one. But first, let me say a few words about the purpose of this conference.

The reason we invited you here today, in simplest terms, is that we want you to succeed. We want each of these 18 projects to reach its goals...to be as good a model for others as possible.

Your success is important to us in OERI and the Department of Education--and to the Nation as a whole--because health is, in a sense, the soil that sustains human growth. As Benjamin Disraeli (British statesman, author, prime minister 1870s) said, "The health of the people is

really the foundation upon which all their happiness and all their powers as a state depend."

Healthy young people are a necessary but insufficient condition for achieving several of the national goals tentatively proposed by President Bush and the governors in Charlottesville two months ago.

Take the suggested goal of making schools safe, disciplined, and drug-free. These 18 projects, if successful and well documented, cannot help but improve the orderliness and the overall "climate" of schools.

Another proposed goal has to do with reducing dropout rates and improving academic performance, particularly among at-risk youngsters. We all know that too many of our youngsters are graduating unable to read, write, and calculate adequately. We all know that too many American

students get lost in the system and drop out of school.

Many of these 18 projects target youngsters most at risk of getting lost and dropping out. Can your projects help increase the "holding power" of schools serving these disadvantaged youngsters? And can these 18 nationally visible projects produce the salutary side-effect of contributing to much-needed improvements in student learning, particularly among minority and at-risk youngsters?

One of the Federal government's overriding responsibilities in education is helping those most in need. The Department plows billions of dollars per year--\$4.7 billion from Chapter 1 alone--into improving the basic academic competencies of disadvantaged children and adults. All of us here today recognize that academic performance is inextricably linked to physical and mental

health. Thus it is very much in our interest, at the Federal level, to see these school health projects succeed.

Because of the importance and potential impact of Chapter 1 (it is the Department's largest elementary/secondary program)--and because today more than ever, Chapter 1 policies encourage greater family and community involvement--there is a need and an opportunity for Chapter 1 to serve as a vehicle for improving the "total education" of young people. I would like to recommend that each of you seek ways to use this vehicle, to work with state and local Chapter 1 people in your area.

Those are a few obvious reasons that we in the Department want to see your efforts produce results. Let me turn now to three additional and less obvious--but nevertheless important--reasons that I personally want to see these 18 projects produced documented, demonstrable results.

This program embodies three principles that are (and will continue to be) cornerstones of my tenure at OERI. A diversity of approaches. Teamwork. And accountability for results.

First, in health education or any other kind of education, there is no "one right way." Diversity is valuable in a program such as this, for a variety of approaches, if well monitored and accurately evaluated, can lead to overall better approaches. A variety of approaches gives state and local leaders more options, more models to draw on and adapt to the particular needs in their communities.

Diversity certainly characterizes this program. You represent an impressive array of sponsoring groups. These 18 projects are being launched from a number of "bases"--by state agencies, professional associations, regional

laboratories (that OERI supports), a medical institution, school districts, partnerships between universities and schools, a consortium of 10 school districts and a university, and other organizations. And collectively, the projects address all school levels, kindergarten through 12th grade. (Some projects involve--or even target--parents as well.)

Diversity is perhaps most apparent in your various approaches or strategies for improving comprehensive school health education. Some projects will establish health education programs. Several will build upon proven health education curricula such as "Growing Healthy." There will be efforts to identify good programs and to develop systems for evaluating existing programs so as to permit replication elsewhere. Several projects will establish health education resource centers; at least one will develop a state-level office for coordinating, monitoring, and publicizing school health education. One will test a "peer counseling" component;

another will provide a "snapshot" of comprehensive school health education across one the Nation's largest states.

The second important principle encapsulated in this program has to do with a strategy upon which the success of all 18 projects hinges. It is a strategy that I believe American education must make far more use of in the years ahead. Teamwork. All the people, organizations, and institutions affected by a particular program or educational initiative (in this case, health education) must work together as a team.

These 18 projects are by definition "comprehensive" and, as such, depend not only on your efforts but on the efforts of others beyond your immediate staff.

At a time of increased willingness among states and communities to allow individual schools to make their own

decisions (in exchange for better student performance), your cooperative and collaborative efforts could furnish a real and living "model of teamwork" in the many schools and school systems where such models do not exist (even in the abstract). The notion of "integrating" instruction, meshing health education with principles of biology, health teachers collaborating with English teachers, multi-disciplinary team approaches, statewide consortia--these are but glimpses of some of your many proposed strategies that could help advance the restructuring of roles and responsibilities of people in American schools.

The third theme or principle we hope to promote in this program is a focus on performance, on validation of results. Accountability is one of the education themes of the Bush Administration. It is a theme I intend to promote vigorously.

I am delighted to see, for example, that one project will evaluate a statewide comprehensive school health education program to determine the extent to which students are actually acquiring the skills, attitudes, and behaviors that the program was designed to teach. Such a model will be useful to other states.

While such system-wide assessment may not be the expressed purpose of every project, documentation and evaluation are integral to each of your 18 projects. This program was created to help identify comprehensive school health education approaches that work...approaches that can be replicated and adapted elsewhere. Accurate, reliable documentation and evaluation make that possible.

So let me urge today that as your project gets underway, document what you do, and document it meticulously. A fundamental Federal role in education is

the identifying of what works. We cannot fulfill that role without accurate, consistent, reliable documentation. Other health education projects cannot build upon your insights, expertise, and "lessons learned" without such documentation.

In summary, I am excited about this program not only because it could improve the health of America's young but also because the program proceeds on three key principles. It encourages diverse approaches to an educational challenge, team efforts to meet that challenge, and a focus on results.

As I mentioned earlier, we in OERI are committed to helping you make your projects a success. One reason we invited you here is to familiarize and "link" you with the various resources that may be of use to you...resources such as the Key Contact Directory (that was developed by Richard LaPointe's staff).

I also alluded to the fact that teamwork is one of my priorities for OERI. As I told OERI staff when I took office two months ago, each of our 9 regional labs, our 20-some research centers, our 16 ERIC clearinghouses, all OERI staff, every single project and program we support must become part of the Federal research-and-development team. And the goal or mission of this team, which you are now a part of (if you weren't before), is to make a significant and measurable impact on school performance and student learning. The value of our efforts must, in the end, be judged by their impact on student outcomes.

Many members of the OERI team are doing work that is directly or indirectly related to yours. The ERIC clearinghouse on teacher education, for instance, houses information and answers questions about health programs. Another example is the OERI-supported research center on Effective Schooling for Disadvantaged Students at Johns

Hopkins University; the center is this year beginning a project to determine the effectiveness of specific delivery models of family and mental health services (in meeting the needs of schools, families, and children).

Other examples include our drug-free schools recognition program (which has recognized 77 exemplary elementary and secondary school drug prevention and intervention programs); our network of colleges and universities committed to eliminating drug and alcohol abuse on campus; and the National Diffusion Network (or NDN), which collects and disseminates outstanding instructional models. I understand that NDN staff have developed a catalogue of health-related programs and that they will be talking to you today; they're looking for outstanding health-education programs to add to that catalogue.

These examples represent just a few of the R&D team members from OERI. Richard and his staff will be trying to enlist, as members of this Comprehensive School Health Education "team," all health-related programs in the Department.

In addition to strengthening collaboration within the Department, Secretary Cavazos and I are seeking to increase cooperative efforts with other Federal agencies. Tomorrow's keynote speaker, for instance, is Michael McGinnis, the Deputy Assistant Secretary for Health Disease Prevention and Health Promotion in HHS, an office that has earned a reputation as a national leader in promoting health and health education among youngsters. We are exploring ways to work more closely with Mike and his staff.

Also here today and tomorrow are representatives from more than a dozen Federal agencies and national education

organizations concerned with health education. In addition to the Department of Education programs I've already mentioned, we have here representatives of Chapter 1; the Office of Planning, Budget, and Evaluation; and Secretary Cavazos' office.

All of these offices and programs are part of our team. And they are among the resources available to you. I hope you will draw on them and use them.

But perhaps your greatest resource is the people in the other 17 comprehensive school health ed projects. Thus, the somewhat unusual approach of this conference--having each of you make general-session presentations describing your goals and strategies for achieving them--should prove useful to all of us.

Our power to improve school health education grows stronger with the knowledge of what others in the field have done, are doing, and hope to do.

Your efforts here today could help to improve substantially the quality of comprehensive school health education in this Nation's schools.

That is your challenge. I wish you luck, and I look forward to working with you. Thank you.